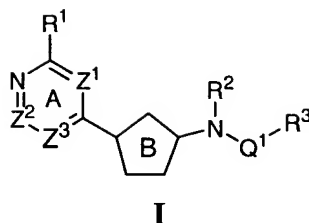
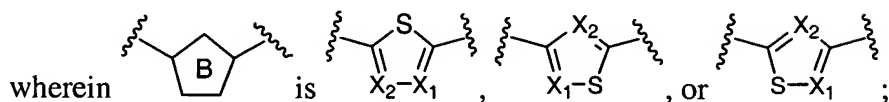


CLAIMS

1. A compound of formula I:



or a pharmaceutically acceptable salt thereof, wherein:



R^1 is halogen, CN, NO_2 , or V_mR ;

Z^1 and Z^3 are each independently N or CR^Z , and Z^2 is N or CR^1 , provided that Z^1 , Z^2 and Z^3 are not simultaneously N;

each occurrence of R^Z is independently halogen, CN, NO_2 , or U_nR' ;

R^2 is U_nR' ;

X^1 and X^2 are each independently CR^4 or N;

each occurrence of R^4 is independently halogen, CN, NO_2 , or V_mR ;

each occurrence of U or V is independently an optionally substituted C_{1-6} alkylidene chain, wherein up to two methylene units of the chain are optionally and independently replaced by $-NR-$, $-S-$, $-O-$, $-CS-$, $-CO_2-$, $-OCO-$, $-CO-$, $-COCO-$, $-CONR-$, $-NRCO-$, $-NRCO_2-$, $-SO_2NR-$, $-NRSO_2-$, $-CONRNR-$, $-NRCONR-$, $-OCONR-$, $-NRNR-$, $-NRSO_2NR-$, $-SO-$, $-SO_2-$, $-PO-$, $-PO_2-$, or $-POR-$;

m and n are each independently 0 or 1;

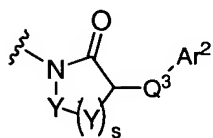
each occurrence of R is independently hydrogen or an optionally substituted C_{1-6} aliphatic group; and each occurrence of R' is independently hydrogen or an optionally substituted C_{1-6} aliphatic group, a 3-8-membered saturated, partially unsaturated, or fully unsaturated monocyclic ring having 0-3 heteroatoms independently selected from nitrogen, oxygen, or sulfur, or an 8-12 membered saturated, partially unsaturated, or fully unsaturated bicyclic ring system having 0-5 heteroatoms independently selected from nitrogen, oxygen, or

sulfur; or R and R', two occurrences of R, or two occurrences of R', are taken together with the atom(s) to which they are bound to form an optionally substituted 3-12 membered saturated, partially unsaturated, or fully unsaturated monocyclic or bicyclic ring having 0-4 heteroatoms independently selected from nitrogen, oxygen, or sulfur;

Q¹ is -CO-, -SO₂-, -CONR-, or -SO₂NR-;

R³ is Q²-Ar¹,

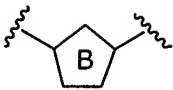
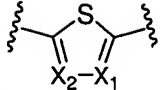
or R² and Q¹-R³, taken together with the nitrogen atom, form the cyclic group:

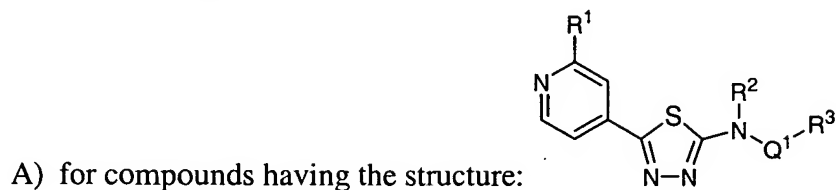


, where s is 1 or 2, each occurrence of Y is independently, as valency and stability permit, -CO-, -CS-, -SO₂-, -O-, -S-, -NR⁵-, or -C(R⁵)₂-, and R⁵ is U_nR';

Q² and Q³ are each independently a bond or a C₁₋₆ alkylidene chain, wherein up to two methylene units of the chain are each optionally and independently replaced by -NR'-, -S-, -O-, -CS-, -CO₂-, -OCO-, -CO-, -COCO-, -CONR'-, -NR'CO-, -NR'CO₂-, -SO₂NR'-, -NR'SO₂-, -CONR'NR'-, -NR'CONR'-, -OCONR'-, -NR'NR'-, -NR'SO₂NR'-, -SO-, -SO₂-, -PO-, -PO₂-, or -POR'-; and wherein any carbon atom in the one or more methylene units is optionally substituted with one or two occurrences of R⁶, wherein each occurrence of R⁶ is independently halogen, CN, NO₂, or U_nR', or two occurrences of R⁶, or R' and R⁶, taken together with the atoms to which they are bound, form an optionally substituted 3-6-membered cycloalkyl, heterocyclyl, aryl or heteroaryl ring; and

Ar¹ and Ar² are each independently a 5-8 membered saturated, partially unsaturated, or fully unsaturated monocyclic ring having 0-3 heteroatoms independently selected from nitrogen, oxygen, or sulfur, or an 8-12 membered saturated, partially unsaturated, or fully unsaturated bicyclic ring system having 0-5 heteroatoms independently selected from nitrogen, oxygen, or sulfur; wherein Ar¹ and Ar² are each optionally substituted with 0-5 independent occurrences of TR⁷; wherein T is a bond or is a C₁₋₆ alkylidene chain wherein up to two methylene units of T are optionally and independently replaced by -NR-, -S-, -O-, -CS-, -CO₂-, -OCO-, -CO-, -COCO-, -CONR-, -NRCO-, -NRCO₂-, -SO₂NR-, -NRSO₂-, -CONRNR-, -NRCONR-, -OCONR-, -NRNR-, -NRSO₂NR-, -SO-, -SO₂-, -PO-, -PO₂-, or -POR-; and each occurrence of R⁷ is independently R', halogen, NO₂, or CN; provided that:

I. for compounds described where  is , one or more of, or all of the following conditions apply:



i) when R^1 is Cl, and R^2 is $-\text{CH}(\text{CH}_3)\text{COOCH}_3$ or hydrogen, then $Q^1\text{-}R^3$ is not $-\text{CO}(\text{unsubstituted phenyl})$, $-\text{CO}(\text{unsubstituted 2-furyl})$, or $-\text{COCH}_2(\text{unsubstituted phenyl})$;

ii) when R^1 is hydrogen, R^2 is hydrogen, and Q^1 is $-\text{CO}-$, then R^3 is not:

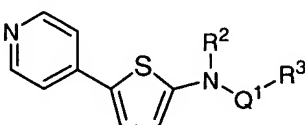
- a) phenyl substituted with $4\text{-O}(\text{CH}_2)_{4-7}\text{CH}_3$ or $4\text{-(CH}_2)_{4-7}\text{CH}_3$;
- b) phenyl substituted with 2-Cl, 4- NO_2 , 4-Cl, 2-Br, 3-Br, 3-I, 3- CH_3 , 4- OCH_3 , 3- NO_2 , or 4-I;
- c) 2,6- OCH_3 -phenyl
- d) (5-Cl, 3- CH_3 , 1-phenyl)-pyrazol-4-yl; or
- e) 4-OnBu-phenyl, $-\text{CH}_2\text{O}(2\text{-F-phenyl})$, $-(\text{CH}_2)_2\text{phenyl}$, furan-2-yl, thiophen-2-yl, 4- CH_3 -phenyl, $-\text{CH}_2\text{O}(2\text{-CH}_3\text{-phenyl})$, 3- OCH_3 -phenyl, 2-(2,5-dimethoxyphenyl)quinolin-4-yl, $-\text{NH}(4\text{-Cl-phenyl})$, $-\text{NH}(3,4\text{-dichlorophenyl})$, (2- CO_2H , 3- NO_2)-phenyl, 3,5-dimethyl-1,3,4-oxadiazol-4-yl, $-\text{CH}=\text{CH}$ -phenyl, 4-F-phenyl, $\text{C}(\text{CH}_3)_2\text{O}(4\text{-Cl-phenyl})$, $-\text{NH}(3\text{-Cl-phenyl})$, $-\text{NHphenyl}$, unsubstituted phenyl, 3,4,5- OCH_3 -phenyl, 4- NO_2 -phenyl, 4-cyclopentoxo-phenyl, $-(\text{CH}_2)_3\text{phenyl}$, (tricyclo[3.3.1.1^{3,7}]decan-1-yl, $-\text{CH}_2\text{O}(3\text{-CH}_3\text{-phenyl})$, 3- NO_2 -phenyl, $-\text{cyclopropyl}(4\text{-tert-butyl-phenyl})$, 2,3- OCH_3 -phenyl, 1,3-benzodioxo-5-yl, $-\text{CH}_2\text{-O}(4\text{-F-phenyl})$, or 3-Br-phenyl;

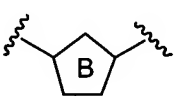
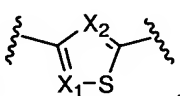
iii) when R^1 is hydrogen, R^2 is hydrogen, and Q^1 is $-\text{CSNH}-$, then R^3 is not 2,3,4,6-tetra-O-acetyl- β -D-glucopyranosyl;

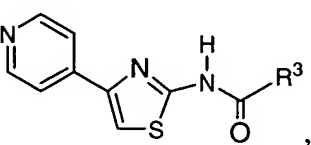
iv) when R^1 is hydrogen, R^2 is hydrogen, and Q^1 is SO_2 , then R^3 is not unsubstituted phenyl, unsubstituted benzyl, unsubstituted naphthyl, phenyl substituted with para- NHCOCH_3 , para- NH_2 , or para- CH_3 ; and

v) when R^1 is hydrogen, R^2 is $-\text{CH}_2\text{CH}=\text{CH}_2$, and Q^1 is CO, then R^3 is not 4-OCH₃-phenyl, unsubstituted naphthyl, -NH-(4-OCH₃-phenyl), 3,5-OCH₃-phenyl, -CH₂Ophenyl, -CH₂-thiophen-2-yl, or -CH(phenyl)(CH₂CH₃); and

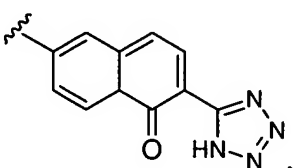
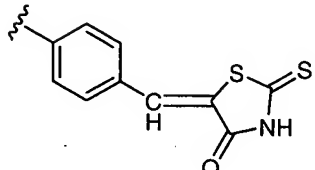
vi) when R^1 is hydrogen, R^2 is CH₂CH₃, and Q^1 is CO, then R^3 is not 2,4-Cl-phenyl; and

B) for compounds having the structure: , when R^2 is hydrogen or CH₃, and Q^1 is -CO-, then R^3 is not -OCH₂CH₂OCH₂phenyl;

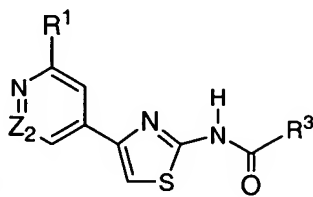
II. for compounds described where  is , one or more of, or all of the following conditions apply:

A) for compounds having the structure: ,

i) when R^3 is $Q^2\text{-Ar}^1$, and Q^2 is a bond then Ar^1 is not any one or more of the following: unsubstituted phenyl or phenyl substituted with 2-Br; 2-Cl; 2-I; 2,6-F; 3,5-OCH₃; 3,4,5-OCH₃; 2,4-OCH₃; 3,4-CH₃; 2,5-Cl; 3,4,-OCH₃; 2-Cl, 5-NO₂; 3,5-Cl; 3-O(CH₂)₄CH₃, 3-O-n-butyl, 3-CF₃, 3-OCH₃, 3-Br; 3-NO₂; 3-CH₃; 3-O-phenyl; 3-Cl; 4-N(CH₃)₂; 4-N(CH₂CH₃)₂; 4-SO₂N(R')₂; 4-CN; 4-COOCH₃; 4-C(O)phenyl; 4-phenyl; 4-tert-butyl, 4-O-phenyl; 4-O-isopropyl; 4-OCH₃; 4-OCH₂CH₃; 4-O-n-butyl; 4-Cl; 4-Br; 4-F; 4-CH₃; 4-NO₂; 4-Cl; 3-NO₂, 4-morpholino; 3-NO₂, 2,5-dioxopyrrolidinyl, or 4-piperidinyl; and

ii) R^3 is not any one or more of the following groups: , , -CH=CH(thiophen-2-yl), -CH=CH-unsubstituted phenyl, -CH₂(3-NHCOPh-phenyl), -6-bromo-2-(4-ethylphenyl)-4-quinolinyl, -CH₂-pyrrolidine,

unsubstituted cyclohexyl, unsubstituted benzyl, unsubstituted furan-2-yl, $-\text{CH}=\text{CH}(3\text{-NO}_2\text{-phenyl})$, $-\text{CH}=\text{CH}(4\text{-NO}_2\text{-phenyl})$, $-\text{CH}_2\text{-naphthyl}$, unsubstituted naphthyl, unsubstituted thiophene, unsubstituted cyclopropyl, 1,4-benzodioxin, 2-oxo-1-benzopyran, 4-oxo-1-benzopyran, 2-thienyl-quinolin-4-yl, 3-chloro-benzo[b]thiophen-2-yl, 5-Br-(thiophen-2-yl), 5-Cl-(thiophen-2-yl), 5-NO₂-(thiophen-2-yl), 5-NO₂-(furan-2-yl), 2,5-Cl-(thiophen-3-yl), $-\text{CH}=\text{CH}-(5\text{-NO}_2\text{-thiophen-2-yl})$, 5-NO₂-(benzothiophen-2-yl), 3-OCH₃-(naphth-2-yl), $-\text{CH}_2\text{O}(2,4\text{-Cl-phenyl})$, $-(\text{CH}_2)_2\text{S-phenyl}$, 2-phenyl-quinolin-4-yl, $-\text{CH}_2\text{O}(4\text{-Cl-phenyl})$, $-\text{CH}_2\text{CH}_2\text{-3-(4-Cl-phenyl)-1-phenyl-1-H-pyrazol-4-yl}$, or $-\text{CH}_2(1,3\text{-dioxoisindole})$; and

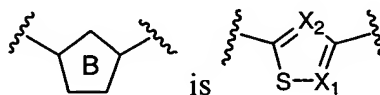


B) for compounds having the structure:

i) when R¹ is Cl, and X₁ is C-Cl, then R³ is not NHSO₂-(2-CF₃-phenyl) or – NHSO₂-(2,6-dimethoxy-phenyl);

ii) when R¹ is CH₃, and X₁ is C-CH₃, then R³ is not an optionally substituted indole or optionally substituted dihydroindole; and

C) for compounds of general formula I, when Z₁, Z₂ and Z₃ are each CH, R¹ is H, X¹ is CH and X₂ is C-COOCH₃, then R³ is not 2-(4-ethyl-phenyl)-6-bromo-quinolin-4-yl; and



III. for compounds described above where is one or more of, or all of the following conditions apply:

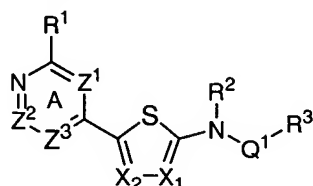
A) when Z¹, Z² and Z³ are each CH, X² is N, X¹ is CH, Q¹ is –CONR–, and R² is hydrogen or –CH₃, then R³ is not optionally substituted pyridyl, optionally substituted thiazol-4-yl, $-\text{CH}_2\text{pyridyl}$, benzimidazol-4-yl, quinolin-2-yl, 1-bromo-isoquinolin-3-yl, benzthiazol-2-yl, optionally substituted 5,6,7,8-tetrahydro-naphthyridin-2-yl, or phenyl substituted with $-\text{CH}_2\text{piperidiny}$; and

B) when Z¹, Z² and Z³ are each CH, X² is N, X¹ is CH, Q¹ is SO₂, and R² is hydrogen, then R³ is not phenyl substituted with where R'' is hydrogen or –COCH₃;

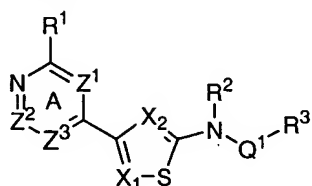
C) when Z^1 , Z^2 and Z^3 are each CH, X_1 is C-CO₂H, X^2 is CH, R^2 is hydrogen, and Q^1 is SO₂, then R^3 is not 2-CH₃-phenyl; and

D) when Z^1 , Z^2 and Z^3 are each CH, X_1 is CH, X^2 is N, R^2 is hydrogen, and Q^1 is CO, then R^3 is not 5-methoxy-6-trifluoromethyl-1H-indole.

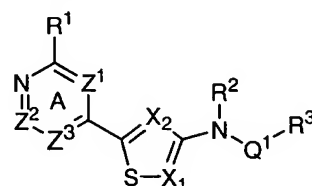
2. The compound of claim 1, wherein the compound has one of the structures:



I-A

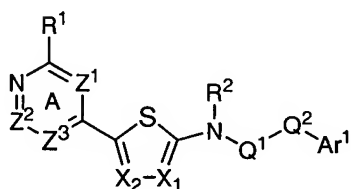


I-B

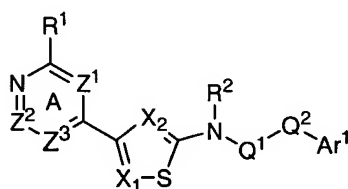


or **I-C.**

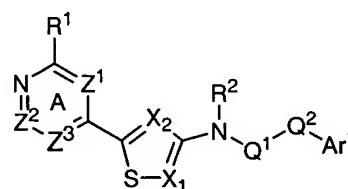
3. The compound of claim 1, wherein R^3 is Q^2 -Ar¹ and compounds have one of formulas **I-A-i**, **I-B-i**, or **I-C-i**:



I-A-i



I-B-i



I-C-i.

4. The compound of claim 3, wherein R^2 is hydrogen, or is U_nR' , where n is 1, and U is a C₁₋₆ alkylidene chain wherein one or two methylene units are optionally and independently replaced by O, NR, S, or C(O).

5. The compound of claim 3, wherein U is -CH₂-, -CH₂CH₂-, -CH₂CH₂CH₂-, -CH₂CH₂CH₂CH₂-, -CH₂O-, -CH₂S-, -CH₂NR-, -CH₂CH₂O-, -CH₂CH₂S-, -CH₂CH₂NR-, -CH₂CH₂CH₂O-, -CH₂CH₂CH₂S-, -CH₂CH₂CH₂NR-, -CH₂CH₂CH₂CH₂O-, -CH₂CH₂CH₂CH₂S-, -CH₂CH₂CH₂CH₂NR-, -CH₂CH₂OCH₂CH₂-, -(CH₂)₄NHCH₂-, -(CH₂)₃NHCH₂CH₂-, or -CH₂CH₂NHCH₂CH₂-, and preferred R' groups are hydrogen, C₁-C₄alkyl, optionally substituted tetrahydropyranyl, pyrrolidinyl, piperidinyl, piperazinyl, morpholinyl, thiomorpholinyl, pyridinyl, phenyl, or cyclohexyl, or R and R' , taken together

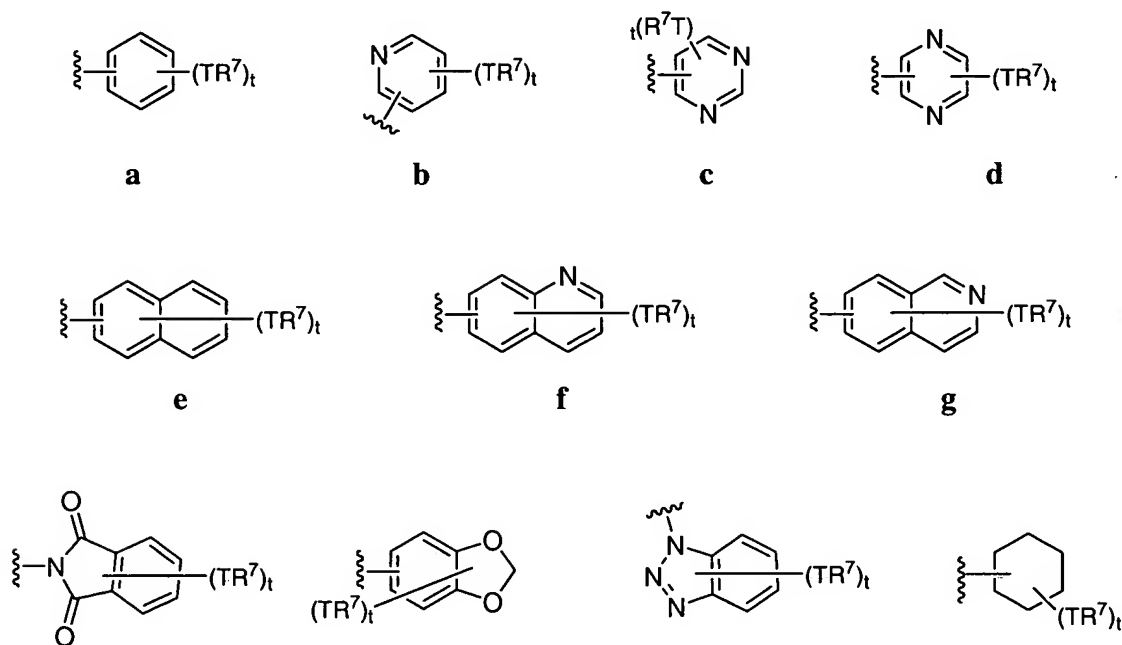
with the nitrogen atom to which they are bound, form an optionally substituted 5- or 6-membered heterocyclyl ring.

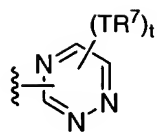
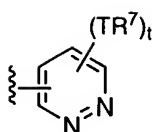
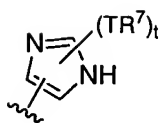
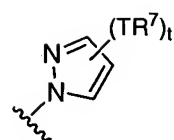
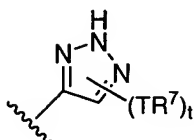
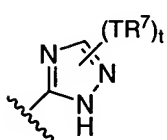
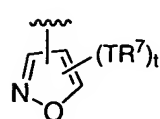
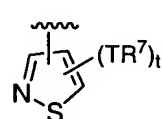
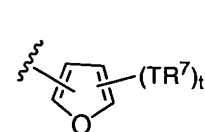
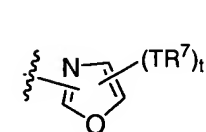
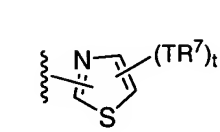
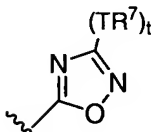
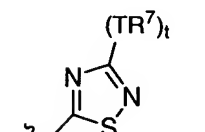
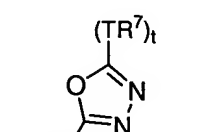
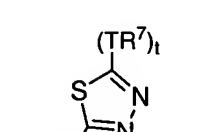
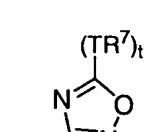
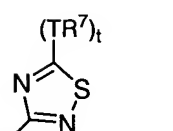
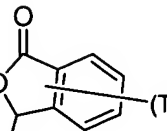
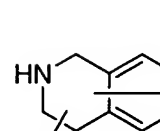
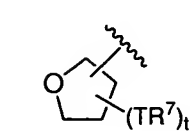
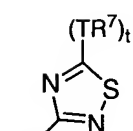
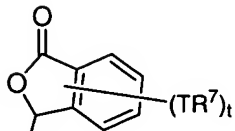
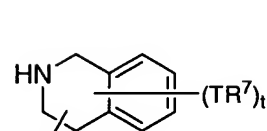
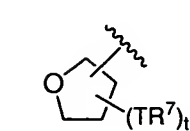
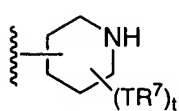
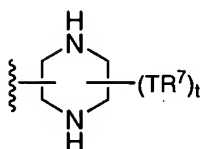
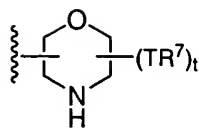
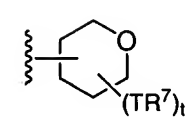
6. The compound of claim 3, wherein Q^1 is $-C(O)-$ or $-SO_2NR-$.

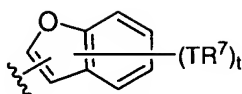
7. The compound of claim 3, wherein Q^2 is a direct bond, or is $-(CHR^6)_q-$, $-(CHR^6)_qO-$, $-(CHR^6)_qS-$, $-(CHR^6)_qS(O)_2-$, $-(CHR^6)_qS(O)-$, $-(CHR^6)_qNR-$, or $-(CHR^6)_qC(O)-$, wherein q is 0, 1, 2, or 3, and R^6 is R' , $-N(R)(R')$, $-(CH_2)_{1-4}N(R)(R')$, $-OR'$, $-(CH_2)_{1-4}OR'$, $-NR(CH_2)_{1-4}N(R)(R')$, $-NR(CH_2)_{1-4}SO_2R'$, $-NR(CH_2)_{1-4}COOR'$, or $-NR(CH_2)_{1-4}COR'$, or two occurrences of R^6 , taken together with the atoms to which they are bound, form an optionally substituted 3-6-membered saturated, partially unsaturated, or fully unsaturated ring.

8. The compound of claim 7, wherein R^6 is CH_2OH , CH_2CH_2OH , OH , OMe , OEt , NH_2 , $NH(Me)$, $NH(Et)$, $N(Me)(Me)$, CH_2NH_2 , $CH_2CH_2NH_2$, $NHCO_2t\text{-butyl}$, phenyl, cyclopentyl, methyl, ethyl, isopropyl, cyclopropyl, $NH(CH_2)_3NH_2$, $NH(CH_2)_2NH_2$, $NH(CH_2)_2NHEt$, $NHCH_2\text{pyridyl}$, $NHSO_2\text{phenyl}$, $NHC(O)CH_2C(O)Ot\text{-butyl}$, $NHC(O)CH_2NH_3$, and $NHCH_2\text{-imidazol-4-yl}$.

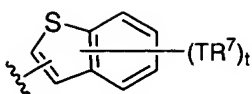
9. The compound of claim 3, wherein Ar^1 is:



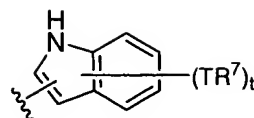
h**i****j****k****l****m****n****o****p****q****r****s****t****u****v****w****x****y****z****aa****bb****cc****dd****ee****ff****gg****hh****ii**



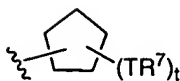
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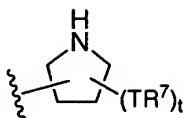
kk



ll



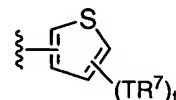
mm



nn



oo



pp

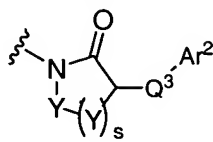
wherein t is 0, 1, 2, 3, 4 or 5, and wherein any Ar^1 is bonded to Q^2 through any substitutable nitrogen or carbon atom, and wherein one or more hydrogen atoms on any substitutable nitrogen or carbon atom is substituted with one or more independent occurrences of TR^7 .

10. The compound of claim 9, wherein Ar^1 is **a, b, e, g, h, i, j, k, r, cc, dd, ff, jj, ll, or pp**.

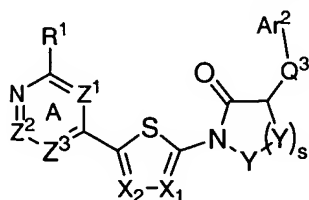
11. The compound of claim 9, wherein T is a bond or is an optionally substituted C_{1-6} alkylidene chain wherein one or two methylene units are optionally and independently replaced by $-O-$, $-NR-$, $-S-$, $-SO_2-$, $-COO-$, $-CO-$, $-OSO_2-$, $-NRSO_2-$, $-CONR-$, or $-SO_2NR-$, and R^7 is R' or halogen.

12. The compound of claim 9, wherein each occurrence of TR^7 is independently $-C_{1-3}$ alkyl, $-OR'$, $-SR'$, $-CF_3$, $-OCF_3$, $-SCF_3$, $-F$, $-Cl$, I , $-Br$, $-COOR'$, $-COR'$, $-O(CH_2)_4N(R)(R')$, $-O(CH_2)_3N(R)(R')$, $-O(CH_2)_2N(R)(R')$, $-O(CH_2)N(R)(R')$, $-O(CH_2)_4CON(R)(R')$, $-O(CH_2)_3CON(R)(R')$, $-O(CH_2)_2CON(R)(R')$, $-O(CH_2)CON(R)(R')$, $-C(O)N(R)(R')$, $-(CH_2)_4OR'$, $-(CH_2)_3OR'$, $-(CH_2)_2OR'$, $-CH_2OR'$, optionally substituted phenyl or benzyl, $-N(R)(R')$, $-(CH_2)_4N(R)(R')$, $-(CH_2)_3N(R)(R')$, $-(CH_2)_2N(R)(R')$, $-(CH_2)N(R)(R')$, or $SO_2N(R)(R')$, $NRSO_2R'$, $CON(R)(R')$, or $-OSO_2R'$.

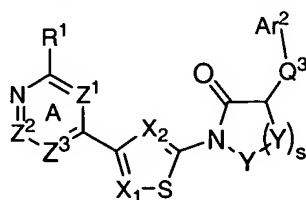
13. The compound of claim 1, wherein R^3 is Q^2-Ar^1 , or R^2 and Q^1-R^3 , taken together with



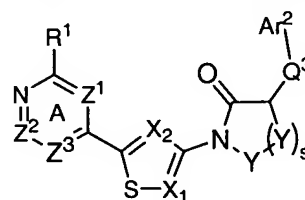
the nitrogen atom, form the cyclic group: , where s is 1 or 2, each occurrence of Y is independently, as valency and stability permit, $-CO-$, $-CS-$, $-SO_2-$, $-O-$, $-S-$, $-NR^5-$, or $-C(R^5)_2-$, and R^5 is U_nR' , and compounds of formula **I-A-ii**, **I-B-ii**, and **I-C-ii** are provided:



I-A-ii



I-B-ii

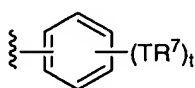


I-C-ii.

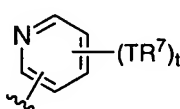
14. The compound of claim 13, wherein Q^3 is a direct bond, or is $-(CHR^6)_q-$, $-(CHR^6)_qO-$, $-(CHR^6)_qS-$, $-(CHR^6)_qS(O)_2-$, $-(CHR^6)_qS(O)-$, $-(CHR^6)_qNR-$, or $-(CHR^6)_qC(O)-$, wherein q is 0, 1, 2, or 3, and R^6 is R' , $-N(R)(R')$, $-(CH_2)_{1-4}N(R)(R')$, $-OR'$, $-(CH_2)_{1-4}OR'$, $-NR(CH_2)_{1-4}N(R)(R')$, $-NR(CH_2)_{1-4}SO_2R'$, $-NR(CH_2)_{1-4}COOR'$, or $-NR(CH_2)_{1-4}COR'$, or two occurrences of R^6 , taken together with the atoms to which they are bound, form an optionally substituted 3-6-membered saturated, partially unsaturated, or fully unsaturated ring.

15. The compound of claim 14, wherein R^6 is CH_2OH , CH_2CH_2OH , OH , OMe , OEt , NH_2 , $NH(Me)$, $NH(Et)$, $N(Me)(Me)$, CH_2NH_2 , $CH_2CH_2NH_2$, $NHCO_2t$ -butyl, phenyl, cyclopentyl, methyl, ethyl, isopropyl, cyclopropyl, $NH(CH_2)_3NH_2$, $NH(CH_2)_2NH_2$, $NH(CH_2)_2NHEt$, $NHCH_2$ pyridyl, $NHSO_2$ phenyl, $NHC(O)CH_2C(O)Ot$ -butyl, $NHC(O)CH_2NH_3$, and $NHCH_2$ -imidazol-4-yl.

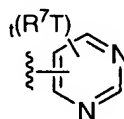
16. The compound of claim 13, wherein Ar^2 is:



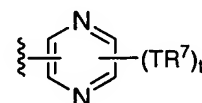
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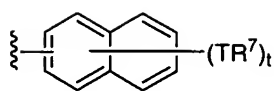
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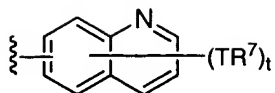
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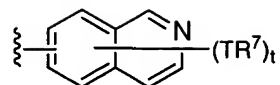
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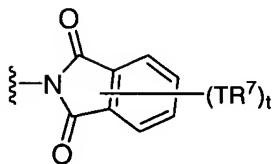
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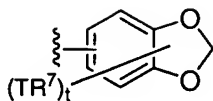
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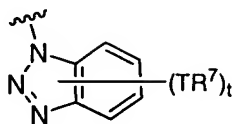
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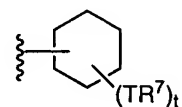
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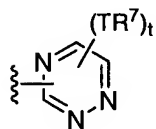
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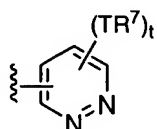
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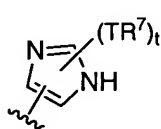
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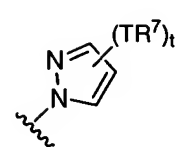
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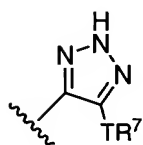
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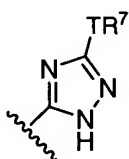
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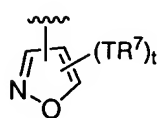
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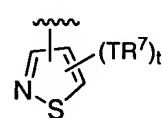
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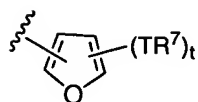
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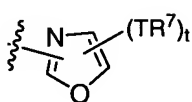
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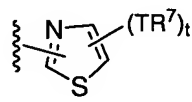
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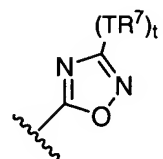
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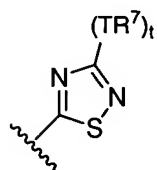
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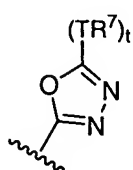
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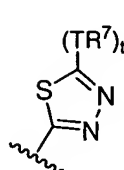
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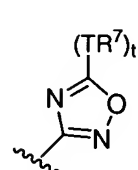
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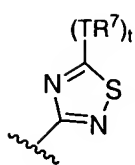
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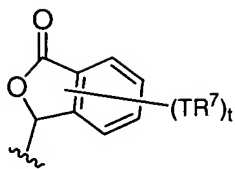
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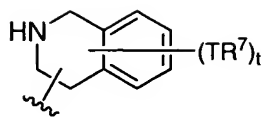
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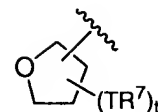
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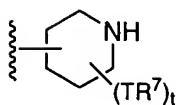
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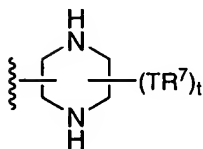
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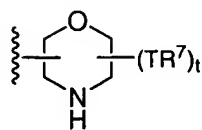
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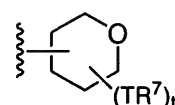
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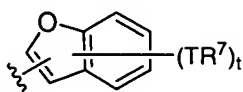
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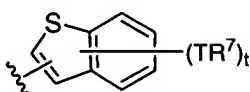
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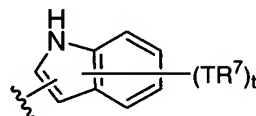
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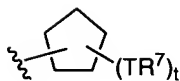
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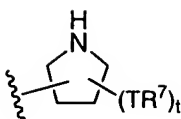
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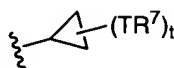
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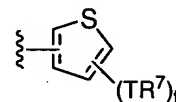
mm



nn



oo



pp

wherein t is 0, 1, 2, 3, 4 or 5, and wherein any Ar^2 is bonded to Q^3 through any substitutable nitrogen or carbon atom, and wherein one or more hydrogen atoms on any substitutable nitrogen or carbon atom is substituted with one or more independent occurrences of TR^7 .

17. The compound of claim 16, wherein Ar^2 is **a, b, e, g, h, i, j, k, n, r, cc, dd, ff, jj, ll, or pp**.

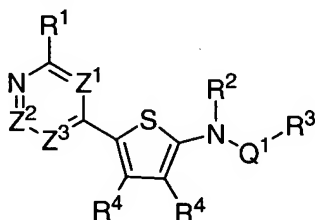
18. The compound of claim 16, wherein T is a bond or is an optionally substituted C_{1-6} alkylidene chain wherein one or two methylene units are optionally and independently

replaced by -O-, -NR-, -S-, -SO₂-, -COO-, -CO-, -OSO₂-, -NRSO₂-, -CONR-, or -SO₂NR-, and R⁷ is R' or halogen.

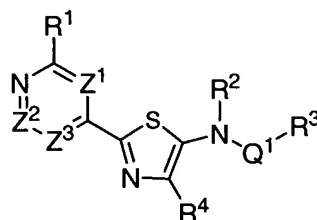
19. The compound of claim 16, wherein each occurrence of TR⁷ is independently -C₁₋₃alkyl, -OR', -SR', -CF₃, -OCF₃, -SCF₃, -F, -Cl, I, -Br, -COOR', -COR', -O(CH₂)₄N(R)(R'), -O(CH₂)₃N(R)(R'), -O(CH₂)₂N(R)(R'), -O(CH₂)N(R)(R'), -O(CH₂)₄CON(R)(R'), -O(CH₂)₃CON(R)(R'), -O(CH₂)₂CON(R)(R'), -O(CH₂)CON(R)(R'), -C(O)N(R)(R'), -(CH₂)₄OR', -(CH₂)₃OR', -(CH₂)₂OR', -CH₂OR', optionally substituted phenyl or benzyl, -N(R)(R'), -(CH₂)₄N(R)(R'), -(CH₂)₃N(R)(R'), -(CH₂)₂N(R)(R'), -(CH₂)N(R)(R'), or SO₂N(R)(R'), NRSO₂R', CON(R)(R'), or -OSO₂R'.

20. The compound of claim 13, wherein R⁵ is hydrogen, (CH₂)₃OR', (CH₂)₂OR', (CH₂)OR', (CH₂)₃N(R')₂, (CH₂)₂N(R')₂, (CH₂)N(R')₂, or C₁₋₄aliphatic.

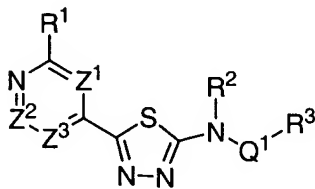
21. The compound of claim 1, wherein X¹ and X² are each independently CR⁴ or N, and compounds have one of formulas II, III, IV, V, VI, VII, VIII, IX, X, XI, XII, or XIII:



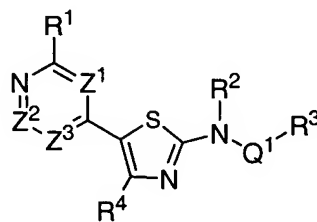
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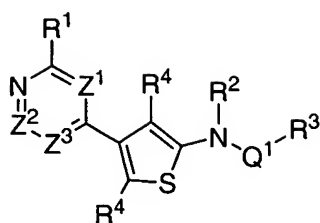
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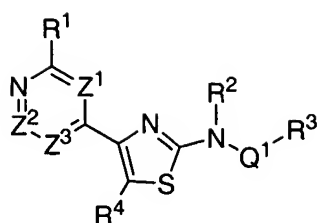
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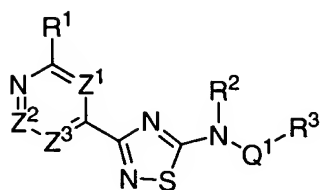
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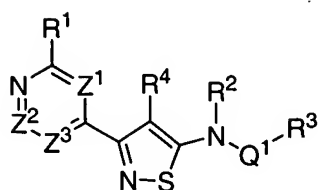
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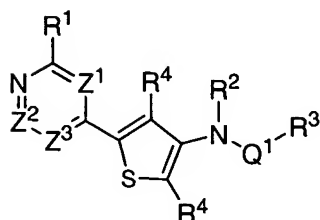
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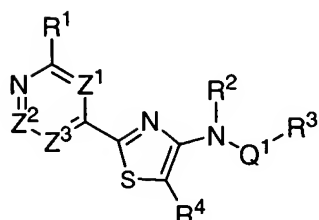
VIII



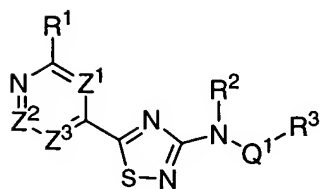
IX



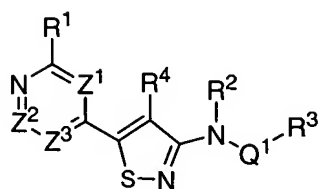
X



XI



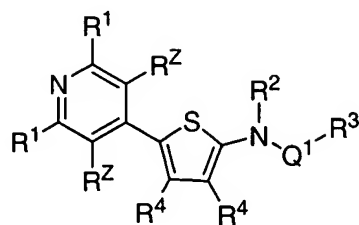
XII



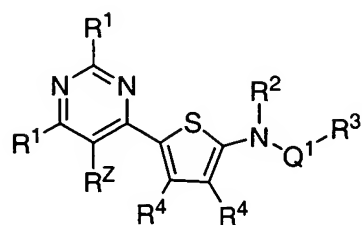
XIII

22. The compound of claim 21, wherein compounds have one of formulas **II-A**, **II-B**, **II-C**, **II-D**, **II-E**, **II-F**, **III-A**, **III-B**, **III-C**, **III-D**, **III-E**, **III-F**, **IV-A**, **IV-B**, **IV-C**, **IV-D**, **IV-E**, **IV-F**, **V-A**, **V-B**, **V-C**, **V-D**, **V-E**, **V-F**, **VI-A**, **VI-B**, **VI-C**, **VI-D**, **VI-E**, **VI-F**, **VII-A**, **VII-B**, **VII-C**, **VII-D**, **VII-E**, **VII-F**, **VIII-A**, **VIII-B**, **VIII-C**, **VIII-D**, **VIII-E**, **VIII-F**, **IX-A**, **IX-B**, **IX-C**, **IX-D**, **IX-E**, **IX-F**, **X-A**, **X-B**, **X-C**, **X-D**, **X-E**, **X-F**, **XI-A**, **XI-B**, **XI-C**, **XI-D**, **XI-E**,

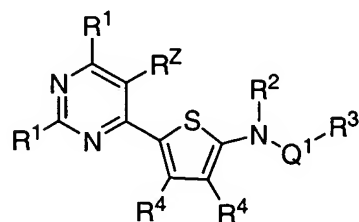
XI-F, XII-A, XII-B, XII-C-, XII-D, XII-E, XII-F, XIII-A, XIII-B, XIII-C, XIII-D, XIII-E, or XIII-F:



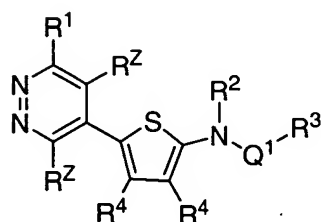
II-A



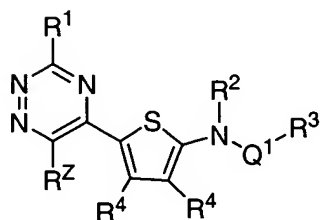
II-B



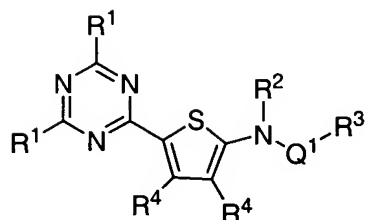
II-C



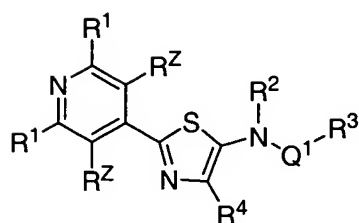
II-D



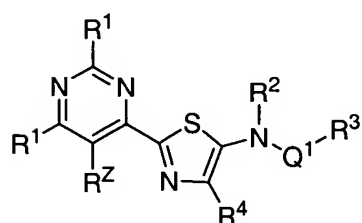
II-E



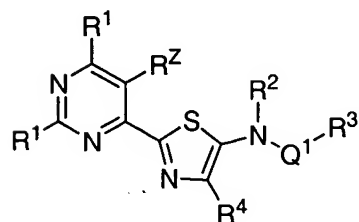
II-F



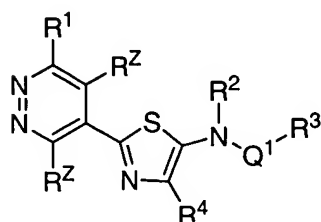
III-A



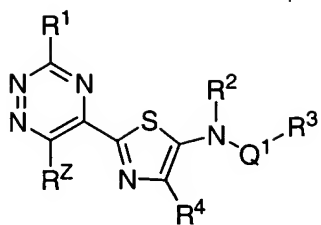
III-B



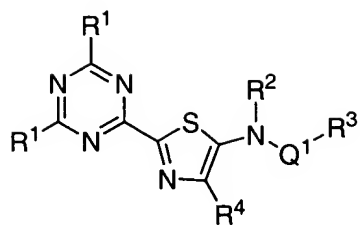
III-C



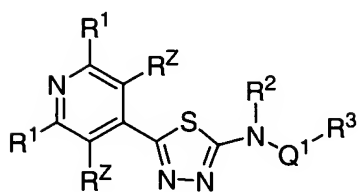
III-D



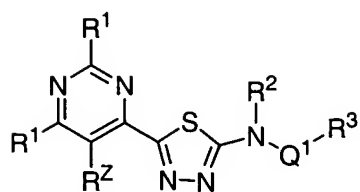
III-E



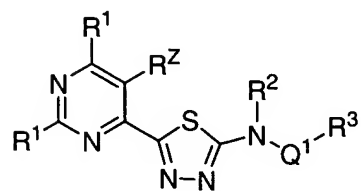
III-F



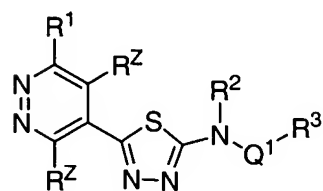
IV-A



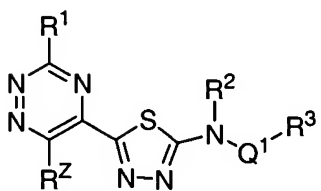
IV-B



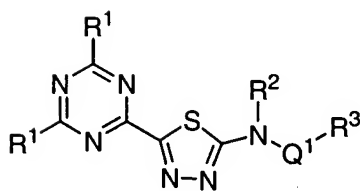
IV-C



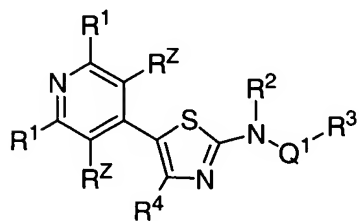
IV-D



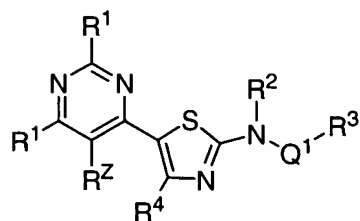
IV-E



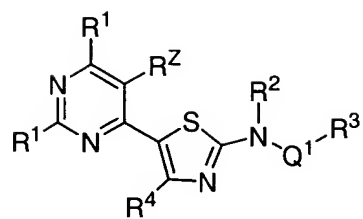
IV-F



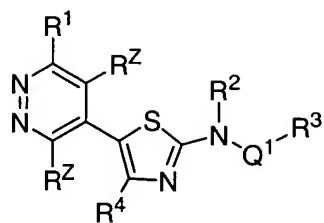
V-A



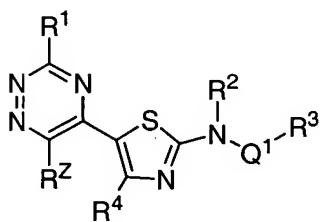
V-B



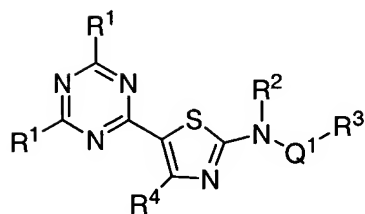
V-C



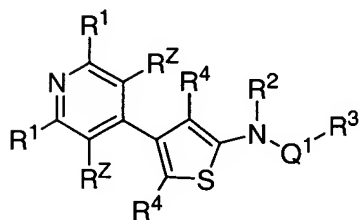
V-D



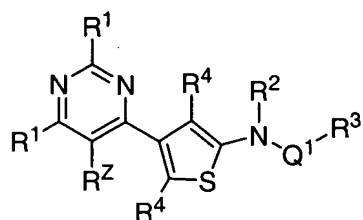
V-E



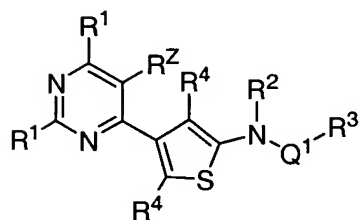
V-F



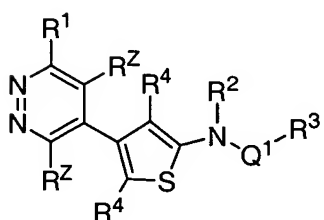
VI-A



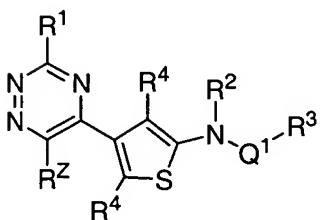
VI-B



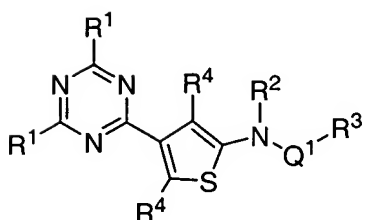
VI-C



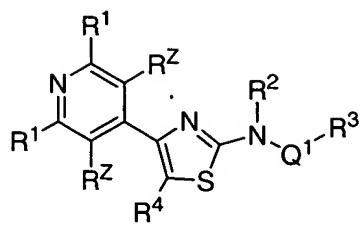
VI-D



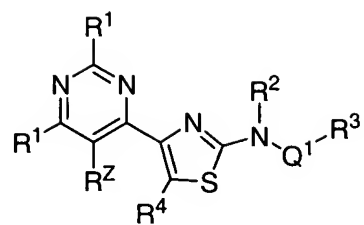
VI-E



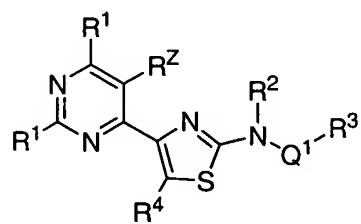
VI-F



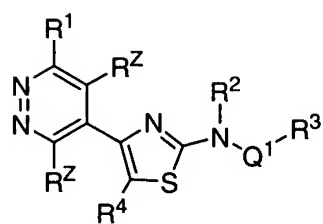
VII-A



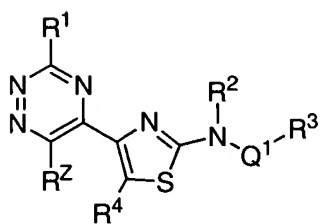
VII-B



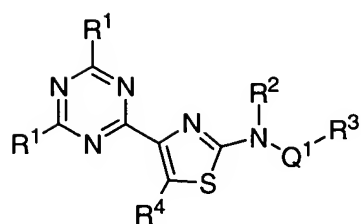
VII-C



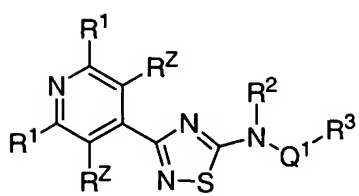
VII-D



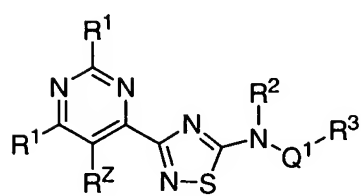
VII-E



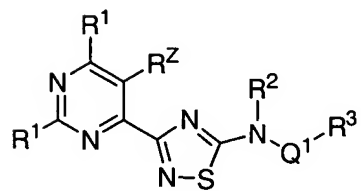
VII-F



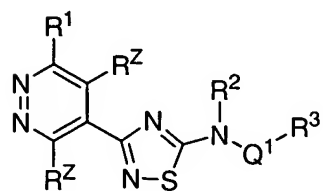
VIII-A



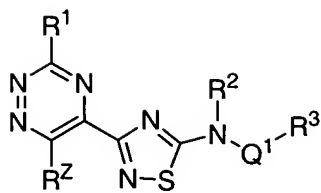
VIII-B



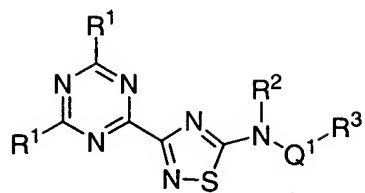
VIII-C



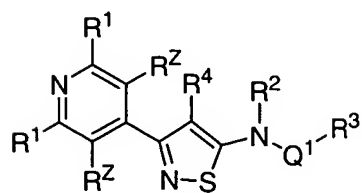
VIII-D



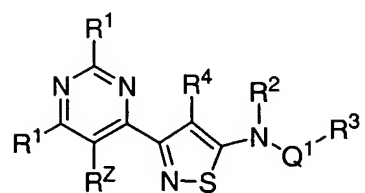
VIII-E



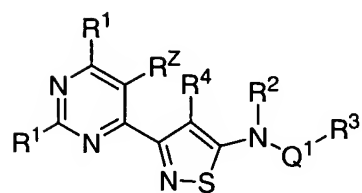
VIII-F



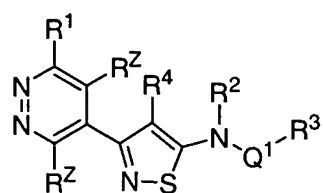
IX-A



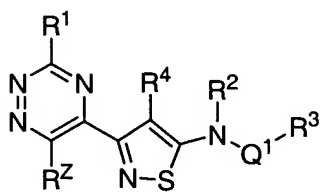
IX-B



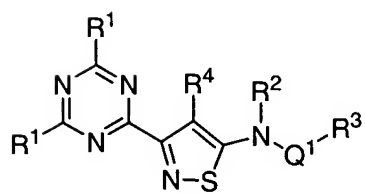
IX-C



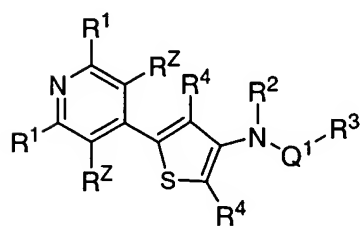
IX-D



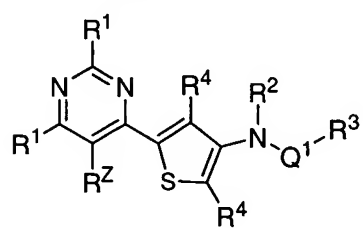
IX-E



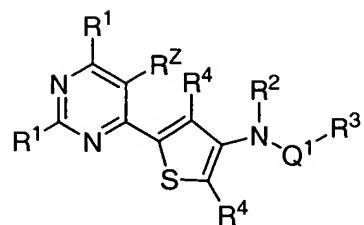
IX-F



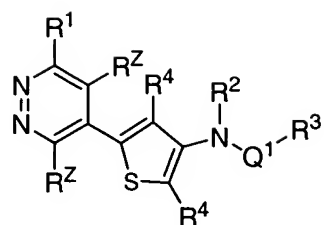
X-A



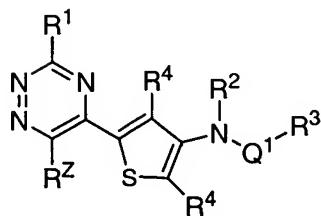
X-B



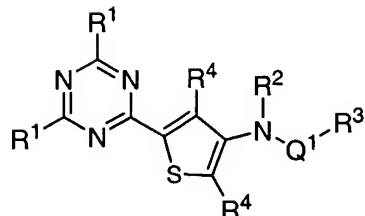
X-C



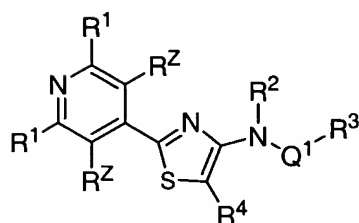
X-D



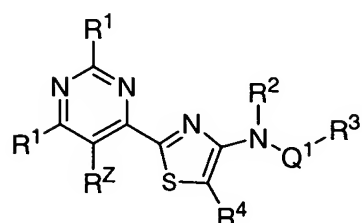
X-E



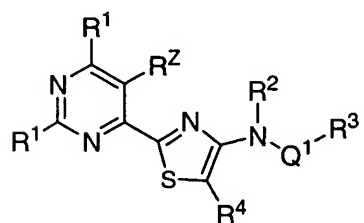
X-F



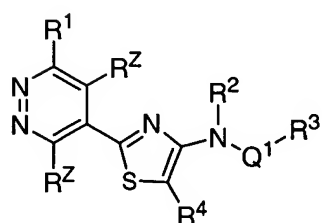
XI-A



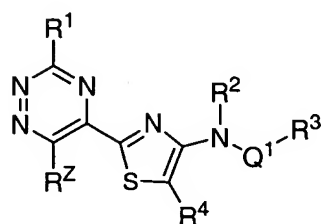
XI-B



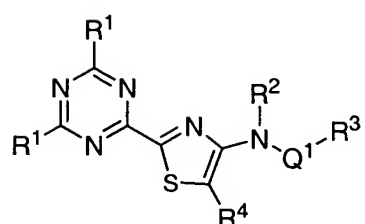
XI-C



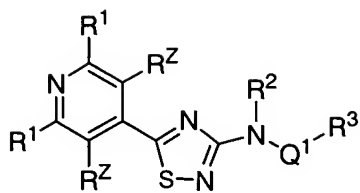
XI-D



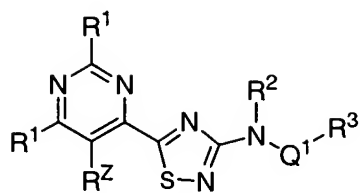
XI-E



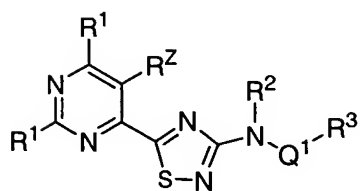
XI-F



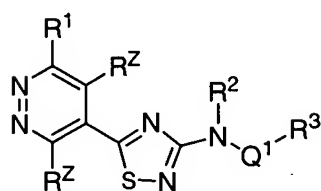
XII-A



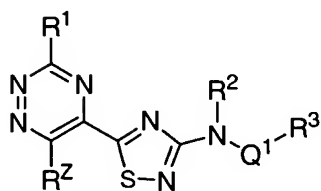
XII-B



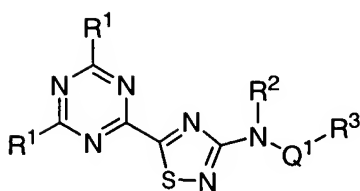
XII-C



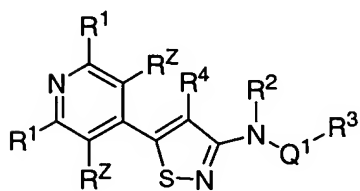
XII-D



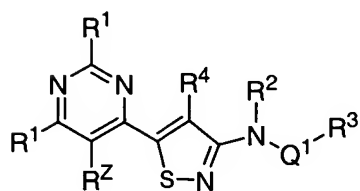
XII-E



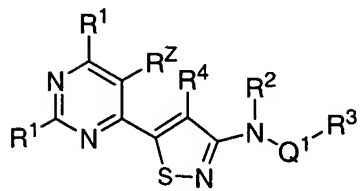
XII-F



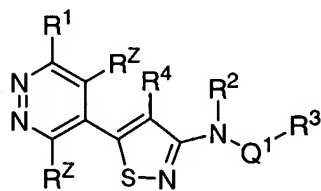
XIII-A



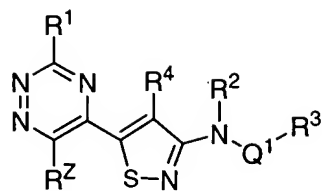
XIII-B



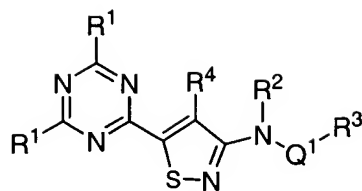
XIII-C



XIII-D

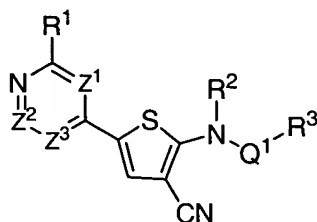


XIII-E



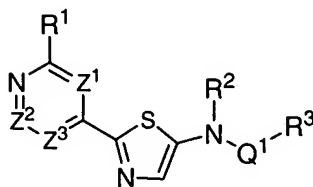
XIII-F

23. The compound of claim 1, wherein each occurrence of R^1 is independently hydrogen, halogen, optionally substituted C_1 - C_4 aliphatic, OR, SR, or $N(R)_2$.
24. The compound of claim 23, wherein each occurrence of R^1 is independently hydrogen, halogen, $-CH_3$, $-CH_2CH_3$, $-OH$, $-OCH_3$, $-SCH_3$, $-NH_2$, $-N(CH_3)_2$, $-N(CH_2CH_3)_2$, $NH(CH_2)_2NHCH_3$, $NH(cyclopropyl)$, $NH(CH_2)cyclopropyl$, or $NH(CH_2)_2N(CH_3)_2$.
25. The compound of claim 1, wherein each occurrence of R^Z is independently hydrogen, halogen, C_1 - C_4 aliphatic, OH, OR' , or $N(R)(R')$.
26. The compound of claim 25, wherein each occurrence of R^Z is independently hydrogen, halogen, Me, OH, OMe, NH_2 , or $N(Me)_2$.
27. The compound of claim 1, wherein R^4 groups are each independently hydrogen, C_1 - C_6 aliphatic, CN, COR, $C(=O)OR$, $C(=O)N(R)_2$, or halogen.
28. The compound of claim 1, wherein one occurrence of R^4 is CN and compounds have the general structure **II-a**:



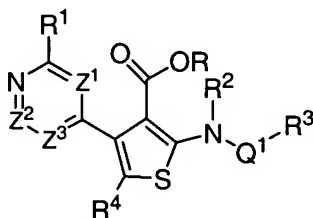
II-a

29. The compound of claim 1, wherein R^4 is hydrogen and compounds have the general structure **III-a**:



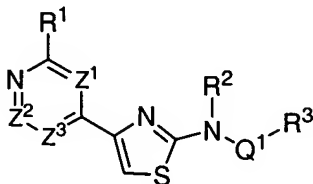
III-a

30. The compound of claim 1, wherein one occurrence of R^4 is hydrogen and the other occurrence of R^4 is -COOR and compounds have the general structure **VI-a**:



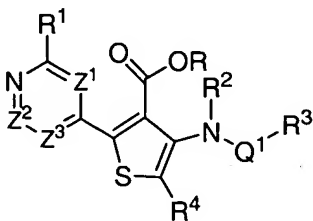
VI-a

31. The compound of claim 1, wherein R^4 is hydrogen and compounds have the general structure **VII-a**:



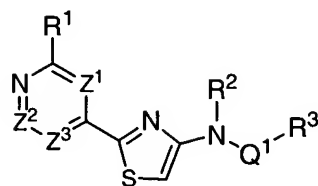
VII-a

32. The compound of claim 1, wherein one occurrence of R^4 is hydrogen and the other occurrence of R^4 is C(=O)OR and compounds have the general structure **X-a**:



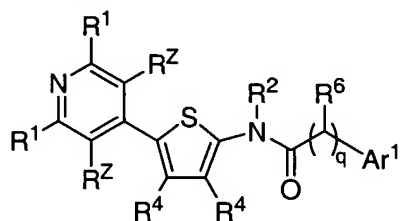
X-a

33. The compound of claim 1, wherein R^4 is hydrogen and compounds have the general structure **XI-a**:

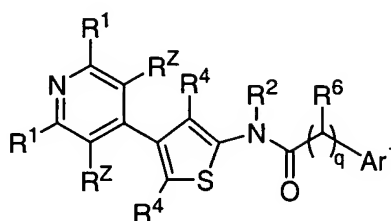


XI-a

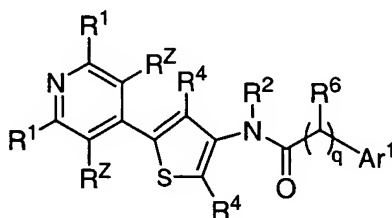
34. The compound of claim 1, wherein Q^1 is $-CO-$, Q^2 is CHR^6 , q is 1, 2, or 3, and compounds have one of formulas **XIV**, **XV**, or **XVI**:



XIV

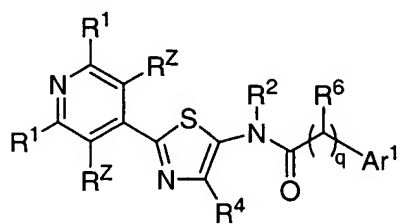


XV

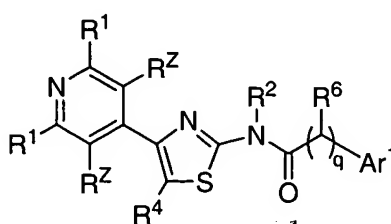


XVI

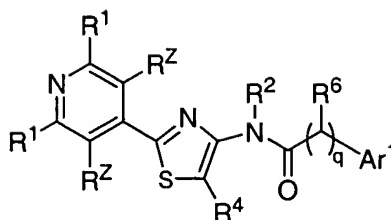
35. The compound of claim 1, wherein Q^1 is $-CO-$, Q^2 is CHR^6 , q is 1, 2 or 3, and compounds have one of formulas **XVII**, **XVIII**, or **XIX**:



XVII



XVIII



XIX

36. The compound of claims 34 or 35, wherein compound variables are selected from one of more of the following groups:

a) each occurrence of R^1 is independently hydrogen, halogen, optionally substituted C_1 - C_4 aliphatic, OR, SR, or $N(R)_2$;

b) each occurrence of R^1 is independently hydrogen, halogen, $-CH_3$, $-CH_2CH_3$, $-OH$, $-OCH_3$, $-SCH_3$, $-NH_2$, $-N(CH_3)_2$, $-N(CH_2CH_3)_2$, $NH(CH_2)_2NHCH_3$, $NH(cyclopropyl)$, $NH(CH_2)cyclopropyl$, or $NH(CH_2)_2N(CH_3)_2$;

c) each occurrence of R^Z is independently hydrogen, halogen, optionally substituted C_1 - C_4 aliphatic, OH, $O(R')$, or $N(R)(R')$;

d) each occurrence of R^Z is independently hydrogen, halogen, Me, OH, OMe, NH_2 , or $N(Me)_2$;

e) R^2 is hydrogen, or is U_nR' , where n is 1, and U is $-CH_2-$, $-CH_2CH_2-$, $-CH_2CH_2CH_2-$, $-CH_2CH_2CH_2CH_2-$, $-CH_2O-$, $-CH_2S-$, $-CH_2NR-$, $-CH_2CH_2O-$, $-CH_2CH_2S-$, $-CH_2CH_2NR-$, $-CH_2CH_2CH_2O-$, $-CH_2CH_2CH_2S-$, $-CH_2CH_2CH_2NR-$, $-CH_2CH_2CH_2CH_2O-$, $-CH_2CH_2CH_2CH_2S-$, $-CH_2CH_2CH_2CH_2NR-$, $-CH_2CH_2OCH_2CH_2-$, $-(CH_2)_4NHCH_2-$, $-(CH_2)_3NHCH_2CH_2-$, or $-CH_2CH_2NHCH_2CH_2-$, and R' groups are hydrogen, C_1 - C_4 alkyl, optionally substituted tetrahydropyranyl, pyrrolidinyl, piperidinyl, piperazinyl, morpholinyl, thiomorpholinyl, pyridinyl, phenyl, or cyclohexyl, or R and R' , taken together with the nitrogen atom to which they are bound, form an optionally substituted 5- or 6-membered heterocyclyl ring;

f) each occurrence of R^4 is independently hydrogen, C_1 - C_6 aliphatic, CN, COR, COOR, $CON(R)_2$, or halogen;

g) q is 1, 2, or 3;

h) R^6 is R' , $-N(R)(R')$, $-(CH_2)_{1-4}N(R)(R')$, $-OR'$, $-(CH_2)_{1-4}OR'$, $-NR(CH_2)_{1-4}N(R)(R')$, $-NR(CH_2)_{1-4}SO_2R'$, $-NR(CH_2)_{1-4}COOR'$, or $-NR(CH_2)_{1-4}COR'$, or two occurrences of R^6 ,

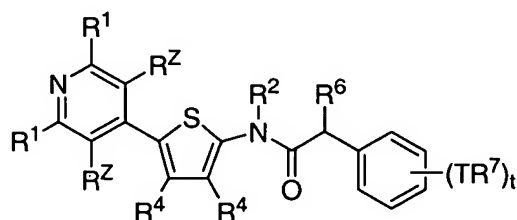
taken together with the atoms to which they are bound, form an optionally substituted 3-6-membered saturated, partially unsaturated, or fully unsaturated ring;

i) R^6 is CH_2OH , CH_2CH_2OH , OH , OMe , OEt , NH_2 , $NH(Me)$, $NH(Et)$, $N(Me)(Me)$, CH_2NH_2 , $CH_2CH_2NH_2$, $NHCO_2t$ -butyl, phenyl, cyclopentyl, methyl, ethyl, isopropyl, cyclopropyl, $NH(CH_2)_3NH_2$, $NH(CH_2)_2NH_2$, $NH(CH_2)_2NHEt$, $NHCH_2$ pyridyl, $NHSO_2$ phenyl, $NHC(O)CH_2C(O)Ot$ -butyl, $NHC(O)CH_2NH_3$, and $NHCH_2$ -imidazol-4-yl;

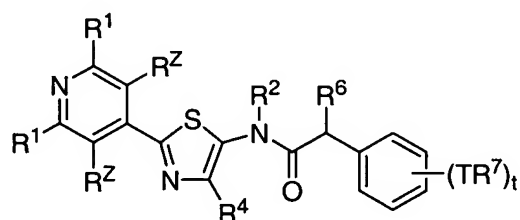
j) Ar^1 is ring **a**, **b**, **e**, **g**, **h**, **i**, **j**, **k**, **r**, **cc**, **dd**, **ff**, **jj**, **ll**, or **pp**, wherein t is 0, 1, 2, or 3, and T is a bond or is an optionally substituted C_{1-6} alkylidene chain wherein one or two methylene units are optionally and independently replaced by $-O-$, $-NR-$, $-S-$, $-SO_2-$, $-COO-$, $-CO-$, $-OSO_2-$, $-NRSO_2-$, $-CONR-$, or $-SO_2NR-$, and R^7 is R' or halogen; or

k) Ar^1 is ring **a**, **b**, **e**, **g**, **h**, **i**, **j**, **k**, **r**, **cc**, **dd**, **ff**, **jj**, **ll**, or **pp**, wherein t is 0, 1, 2, or 3, and each occurrence of TR^7 is independently $-C_{1-3}$ alkyl, $-OR'$, $-SR'$, $-CF_3$, $-OCF_3$, $-SCF_3$, $-F$, $-Cl$, I , $-Br$, $-COOR'$, $-COR'$, $-O(CH_2)_4N(R)(R')$, $-O(CH_2)_3N(R)(R')$, $-O(CH_2)_2N(R)(R')$, $-O(CH_2)N(R)(R')$, $-O(CH_2)_4CON(R)(R')$, $-O(CH_2)_3CON(R)(R')$, $-O(CH_2)_2CON(R)(R')$, $-O(CH_2)CON(R)(R')$, $-C(O)N(R)(R')$, $-(CH_2)_4OR'$, $-(CH_2)_3OR'$, $-(CH_2)_2OR'$, $-CH_2OR'$, optionally substituted phenyl or benzyl, $-N(R)(R')$, $-(CH_2)_4N(R)(R')$, $-(CH_2)_3N(R)(R')$, $-(CH_2)_2N(R)(R')$, $-(CH_2)N(R)(R')$, or $SO_2N(R)(R')$, $NRSO_2R'$, $CON(R)(R')$, or $-OSO_2R'$.

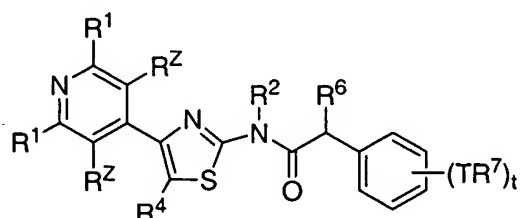
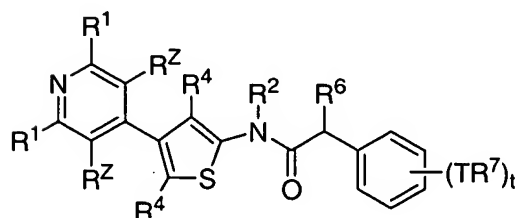
37. The compound of claim 34 or 35, q is 1, and Ar^1 is optionally substituted phenyl and compounds of general formula **XIV-A** through **XIX-A** are provided:

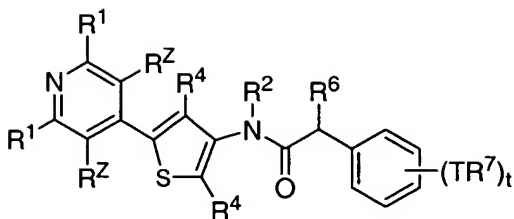
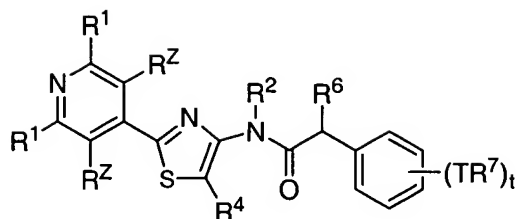


XIV-A



XV-A



XVI-A**XVIII-A****XVII-A****XIX-A**

wherein:

each occurrence of R^1 is hydrogen;

each occurrence of R^Z is hydrogen;

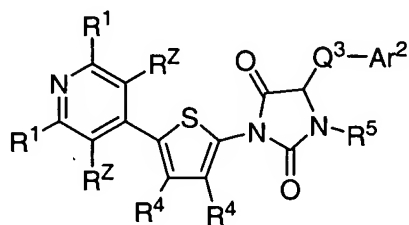
R^2 is hydrogen, or is U_nR' , where n is 1, and U is $-CH_2-$, $-CH_2CH_2-$, $-CH_2CH_2CH_2-$, $-CH_2CH_2CH_2CH_2-$, $-CH_2O-$, $-CH_2S-$, $-CH_2NR-$, $-CH_2CH_2O-$, $-CH_2CH_2S-$, $-CH_2CH_2NR-$, $-CH_2CH_2CH_2O-$, $-CH_2CH_2CH_2S-$, $-CH_2CH_2CH_2NR-$, $-CH_2CH_2CH_2CH_2O-$, $-CH_2CH_2CH_2CH_2S-$, $-CH_2CH_2CH_2CH_2NR-$, $-CH_2CH_2OCH_2CH_2-$, $-(CH_2)_4NHCH_2-$, $-(CH_2)_3NHCH_2CH_2-$, or $-CH_2CH_2NHCH_2CH_2-$, and R' groups are hydrogen, C_1 - C_4 alkyl, optionally substituted tetrahydropyranyl, pyrrolidinyl, piperidinyl, piperazinyl, morpholinyl, thiomorpholinyl, pyridinyl, phenyl, or cyclohexyl, or R and R' , taken together with the nitrogen atom to which they are bound, form an optionally substituted 5- or 6-membered heterocyclyl ring;

each occurrence of R^4 is independently hydrogen, C_{1-6} aliphatic, CN, COR, COOR, $CON(R)_2$, or halogen;

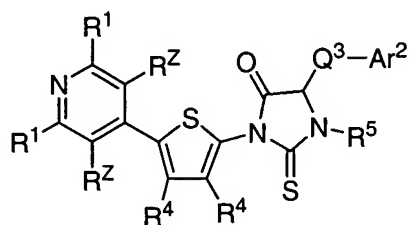
R^6 is R' , $-N(R)(R')$, $-(CH_2)_{1-4}N(R)(R')$, $-OR'$, $-(CH_2)_{1-4}OR'$, $-NR(CH_2)_{1-4}N(R)(R')$, $-NR(CH_2)_{1-4}SO_2R'$, $-NR(CH_2)_{1-4}COOR'$, or $-NR(CH_2)_{1-4}COR'$; and

t is 0, 1, 2, or 3, and each occurrence of TR^7 is independently $-C_{1-3}$ alkyl, $-OR'$, $-SR'$, $-CF_3$, $-OCF_3$, $-SCF_3$, $-F$, $-Cl$, I , $-Br$, $-COOR'$, $-COR'$, $-O(CH_2)_4N(R)(R')$, $-O(CH_2)_3N(R)(R')$, $-O(CH_2)_2N(R)(R')$, $-O(CH_2)N(R)(R')$, $-O(CH_2)_4CON(R)(R')$, $-O(CH_2)_3CON(R)(R')$, $-O(CH_2)_2CON(R)(R')$, $-O(CH_2)CON(R)(R')$, $-C(O)N(R)(R')$, $-(CH_2)_4OR'$, $-(CH_2)_3OR'$, $-(CH_2)_2OR'$, $-CH_2OR'$, optionally substituted phenyl or benzyl, $-N(R)(R')$, $-(CH_2)_4N(R)(R')$, $-(CH_2)_3N(R)(R')$, $-(CH_2)_2N(R)(R')$, $-(CH_2)N(R)(R')$, or $SO_2N(R)(R')$, $NRSO_2R'$, $CON(R)(R')$, or $-OSO_2R'$.

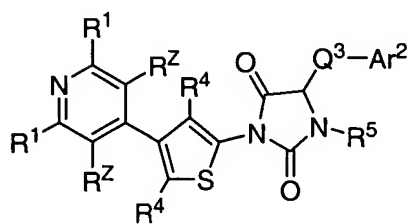
38. The compound of claim 1, wherein R^2 and Q^1-R^3 , taken together with the atoms to which they are bound form a 5-membered cyclic group, and compounds have the general formula **XX** through **XXV**:



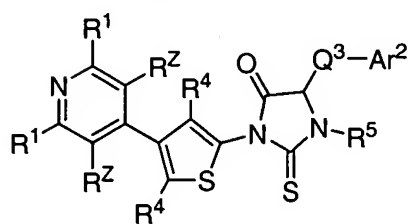
XX



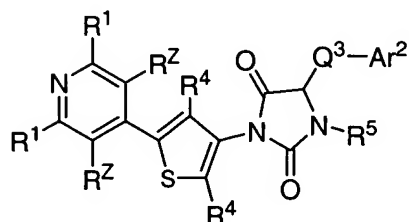
XXI



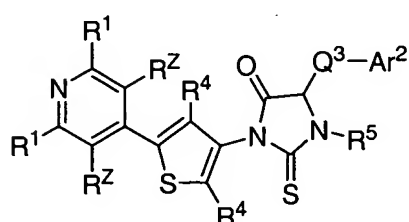
XXII



XXIII

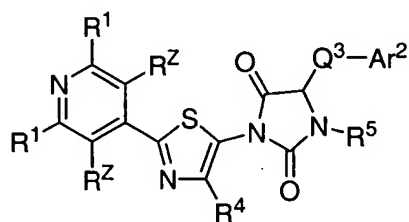


XXIV

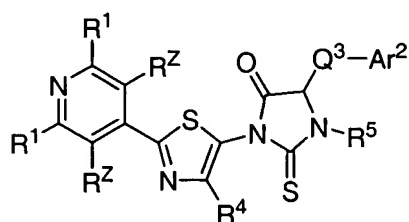


XXV

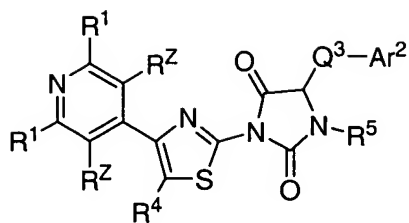
39. The compound of claim 1, R^2 and Q^1-R^3 , taken together with the atoms to which they are bound form a 5-membered cyclic group, and compounds have the general formula **XXVI** through **XXXI**:



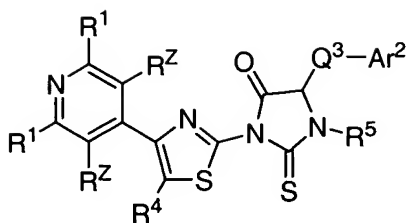
XXVI



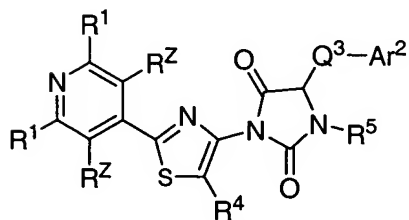
XXVII



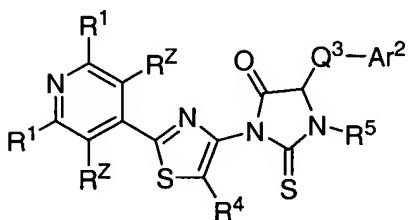
XXVIII



XXIX

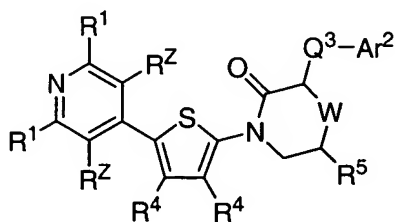


XXX

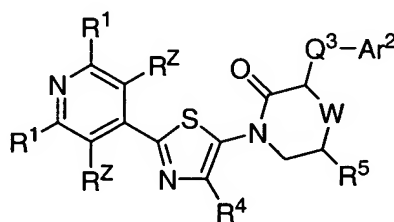


XXXI

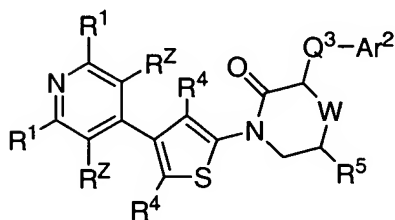
40. The compound of claim 1, wherein R^2 and Q^1-R^3 , taken together with the atoms to which they are bound form a 6-membered cyclic group, and compounds have the general formula **XXXII** through **XXXVII**:



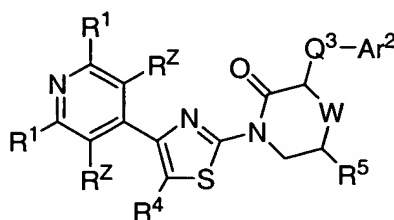
XXXII



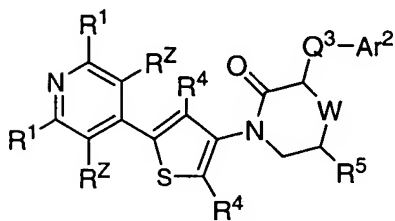
XXXIII



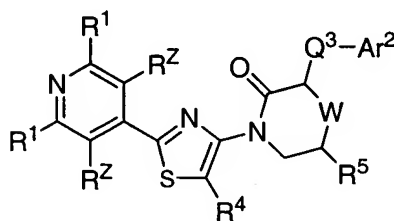
XXXIV



XXXV



XXXVI



XXXVII

wherein W is O, NR⁵, or CHR⁵.

41. The compound of claims 38, 39 or 40, wherein compound variables are selected from one of more of the following groups:

a) each occurrence of R¹ is independently hydrogen, halogen, optionally substituted C₁-C₄aliphatic, OR, SR, or N(R)₂;

b) each occurrence of R^Z is independently hydrogen, halogen, optionally substituted C₁-C₄aliphatic, OH, OR' or N(R)(R');

c) each occurrence of R⁴ is independently hydrogen, C₁₋₆aliphatic, CN, COR, COOR, CON(R)₂, or halogen;

d) R⁵ is hydrogen, (CH₂)₃OR', (CH₂)₂OR', (CH₂)OR', (CH₂)₃N(R')₂, (CH₂)₂N(R')₂, (CH₂)N(R')₂, or C₁₋₄aliphatic;

e) Q³ is a direct bond, or is -(CHR⁶)_q-, -(CHR⁶)_qO-, -(CHR⁶)_qS-, -(CHR⁶)_qS(O)₂-, -(CHR⁶)_qS(O)-, -(CHR⁶)_qNR-, or -(CHR⁶)_qC(O)-, wherein q is 0, 1, 2, or 3; and

f) Ar² is ring **a**, **b**, **e**, **g**, **h**, **i**, **j**, **k**, **n**, **r**, **cc**, **dd**, **ff**, **jj**, **ll**, or **pp**, wherein t is 0, 1, 2, or 3, and T is a bond or is an optionally substituted C₁₋₆ alkylidene chain wherein one or two methylene units are optionally and independently replaced by -O-, -NR-, -S-, -SO₂-, -COO-, -CO-, -OSO₂-, -NRSO₂-, -CONR-, or -SO₂NR-, and R⁷ is R' or halogen.

42. The compound of claims 38, 39 or 40, wherein compound variables are selected from one of more of the following groups:

a) each occurrence of R¹ is independently hydrogen, halogen, -CH₃, -CH₂CH₃, -OH, -OCH₃, -SCH₃, -NH₂, -N(CH₃)₂, -N(CH₂CH₃)₂, NH(CH₂)₂NHCH₃, NH(cyclopropyl), NH(CH₂)cyclopropyl, or NH(CH₂)₂N(CH₃)₂;

b) each occurrence of R^Z is independently hydrogen, halogen, Me, OH, OMe, NH₂, or N(Me)₂;

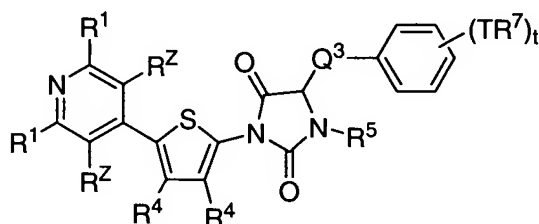
c) each occurrence of R⁴ is independently hydrogen, C₁₋₆aliphatic, CN, COR, COOR, CON(R)₂, or halogen;

d) R⁵ is hydrogen, (CH₂)₃OR', (CH₂)₂OR', (CH₂)OR', (CH₂)₃N(R')₂, (CH₂)₂N(R')₂, (CH₂)N(R')₂, or C₁₋₄aliphatic;

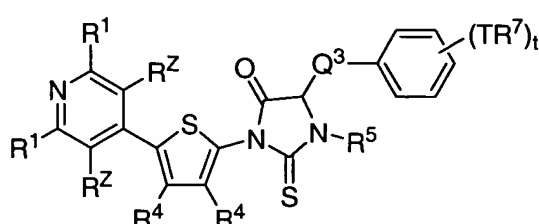
e) Q^3 is a direct bond, or is $-(CHR^6)_q-$, $-(CHR^6)_qO-$, $-(CHR^6)_qS-$, $-(CHR^6)_qS(O)_2-$, $-(CHR^6)_qS(O)-$, $-(CHR^6)_qNR-$, or $-(CHR^6)_qC(O)-$, wherein q is 0, 1, 2, or 3; and

f) Ar^2 is ring **a**, **b**, **e**, **g**, **h**, **i**, **j**, **k**, **n**, **r**, **cc**, **dd**, **ff**, **jj**, **ll**, or **pp**, wherein t is 0, 1, 2, or 3, and each occurrence of TR^7 is independently $-C_{1-3}alkyl$, $-OR'$, $-SR'$, $-CF_3$, $-OCF_3$, $-SCF_3$, $-F$, $-Cl$, I , $-Br$, $-COOR'$, $-COR'$, $-O(CH_2)_4N(R)(R')$, $-O(CH_2)_3N(R)(R')$, $-O(CH_2)_2N(R)(R')$, $-O(CH_2)N(R)(R')$, $-O(CH_2)_4CON(R)(R')$, $-O(CH_2)_3CON(R)(R')$, $-O(CH_2)_2CON(R)(R')$, $-O(CH_2)CON(R)(R')$, $-C(O)N(R)(R')$, $-(CH_2)_4OR'$, $-(CH_2)_3OR'$, $-(CH_2)_2OR'$, $-CH_2OR'$, optionally substituted phenyl or benzyl, $-N(R)(R')$, $-(CH_2)_4N(R)(R')$, $-(CH_2)_3N(R)(R')$, $-(CH_2)_2N(R)(R')$, $-(CH_2)N(R)(R')$, or $SO_2N(R)(R')$, $NRSO_2R'$, $CON(R)(R')$, or $-OSO_2R'$.

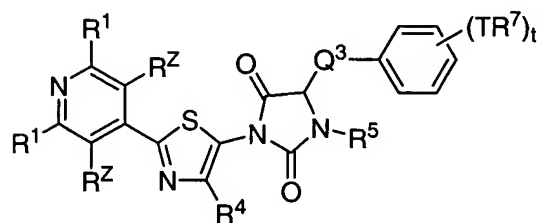
43. The compound of claims 38, 39 or 40, wherein Ar^2 is optionally substituted phenyl and compounds of general formula **XX-A**, through **XXXVII** are provided:



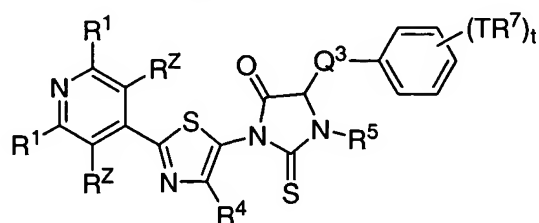
XX-A



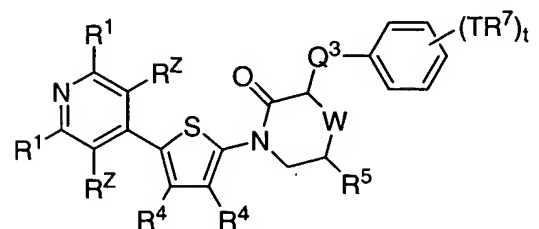
XXI-A



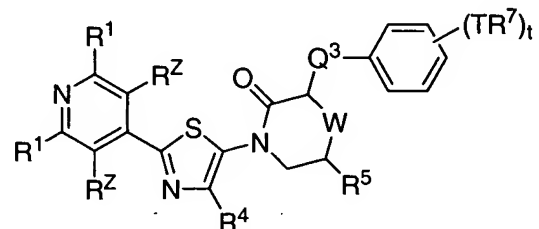
XXII-A



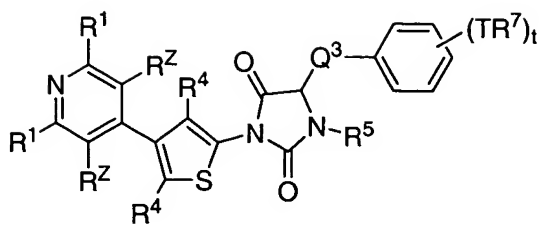
XXIII-A



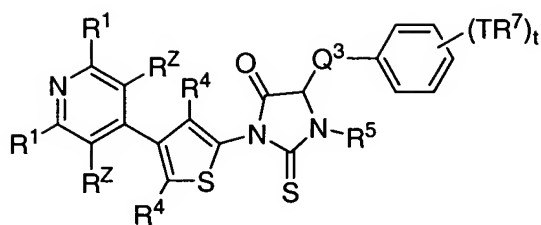
XXIV-A



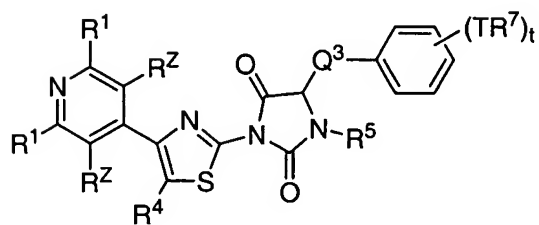
XXV-A



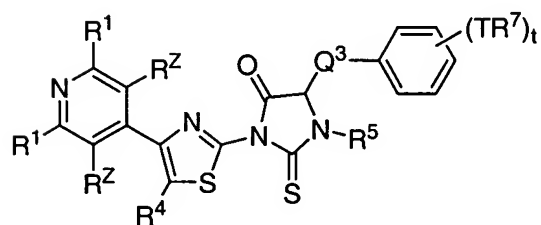
XXVI-A



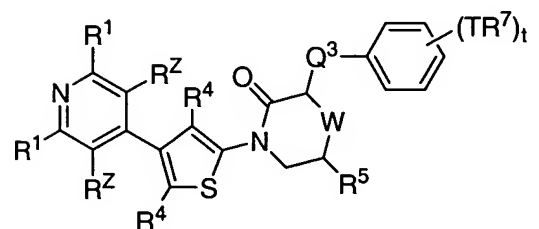
XXVII-A



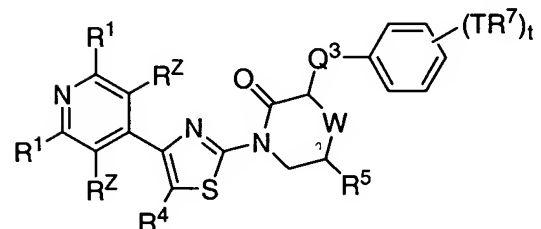
XXVIII-A



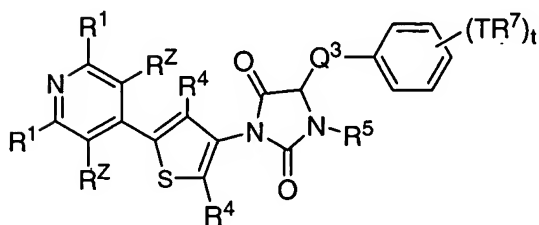
XXIX-A



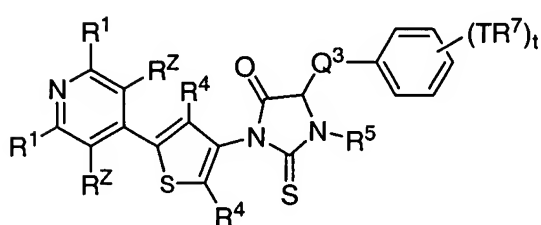
XXX-A



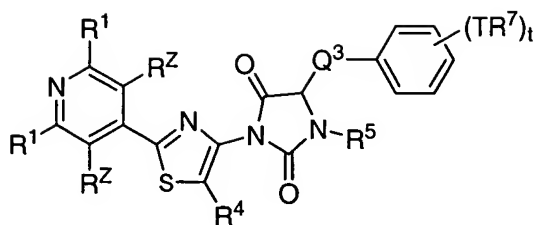
XXXI-A



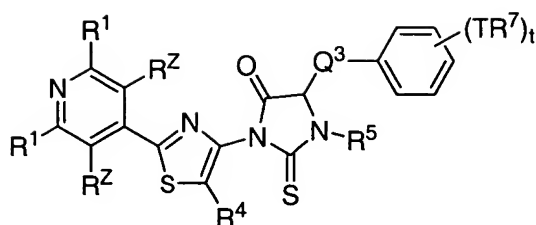
XXXII-A



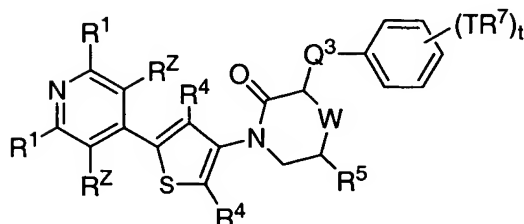
XXXIII-A



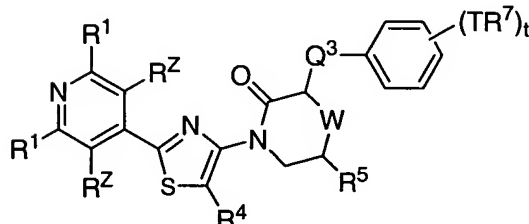
XXXIV-A



XXXV-A



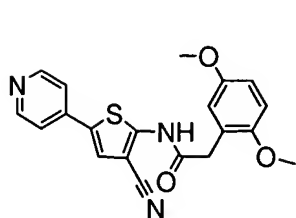
XXXVI-A



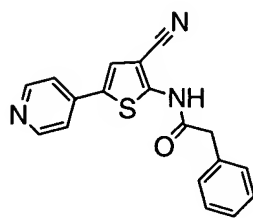
XXXVII-A

44. The compound of claim 43, wherein compound variables are selected from:
- each occurrence of R^1 is hydrogen;
 - each occurrence of R^Z is hydrogen;
 - each occurrence of R^4 is independently hydrogen, C_{1-6} aliphatic, CN, COR, COOR, $CON(R)_2$, or halogen;
 - R^5 is hydrogen, $(CH_2)_3OR'$, $(CH_2)_2OR'$, $(CH_2)OR'$, $(CH_2)_3N(R')_2$, $(CH_2)_2N(R')_2$, $(CH_2)N(R')_2$, or C_{1-4} aliphatic;
 - Q^3 is a direct bond, or is $-(CHR^6)_q-$, $-(CHR^6)_qO-$, $-(CHR^6)_qS-$, $-(CHR^6)_qS(O)_2-$, $-(CHR^6)_qS(O)-$, $-(CHR^6)_qNR-$, or $-(CHR^6)_qC(O)-$, wherein q is 0, 1, 2, or 3; and
 - t is 0, 1, 2, or 3, and each occurrence of TR^7 is independently $-C_{1-3}$ alkyl, $-OR'$, $-SR'$, $-CF_3$, $-OCF_3$, $-SCF_3$, $-F$, $-Cl$, I , $-Br$, $-COOR'$, $-COR'$, $-O(CH_2)_4N(R)(R')$, $-O(CH_2)_3N(R)(R')$, $-O(CH_2)_2N(R)(R')$, $-O(CH_2)N(R)(R')$, $-O(CH_2)_4CON(R)(R')$, $-O(CH_2)_3CON(R)(R')$, $-O(CH_2)_2CON(R)(R')$, $-O(CH_2)CON(R)(R')$, $-C(O)N(R)(R')$, $-(CH_2)_4OR'$, $-(CH_2)_3OR'$, $-(CH_2)_2OR'$, $-CH_2OR'$, optionally substituted phenyl or benzyl, $-N(R)(R')$, $-(CH_2)_4N(R)(R')$, $-(CH_2)_3N(R)(R')$, $-(CH_2)_2N(R)(R')$, $-(CH_2)N(R)(R')$, or $SO_2N(R)(R')$, $NRSO_2R'$, $CON(R)(R')$, or $-OSO_2R'$.

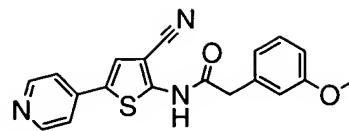
45. The compound of claim 1, having one of the structures:



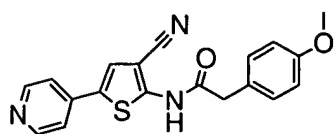
I-A-1



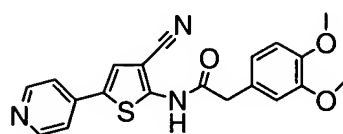
I-A-2



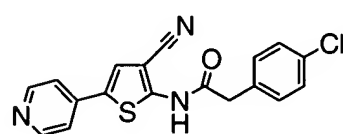
I-A-3



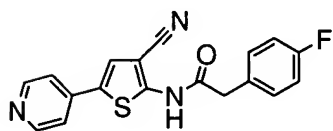
I-A-4



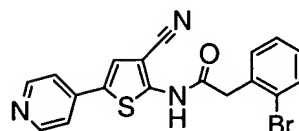
I-A-5



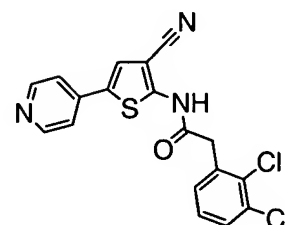
I-A-6



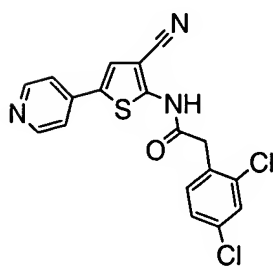
I-A-7



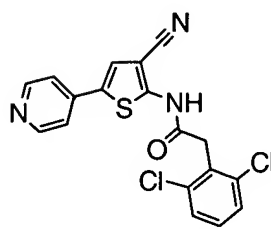
I-A-8



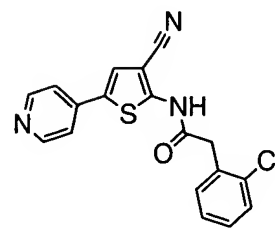
I-A-9



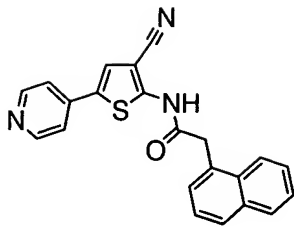
I-A-10



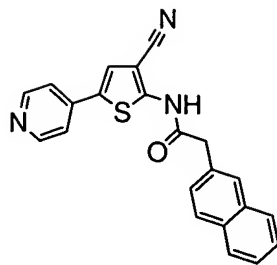
I-A-11



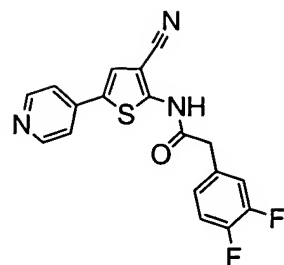
I-A-12



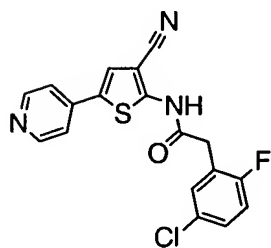
I-A-13



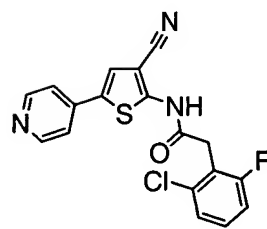
I-A-14



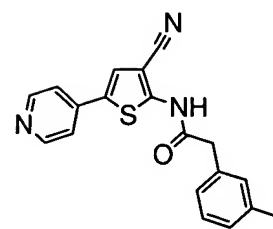
I-A-15



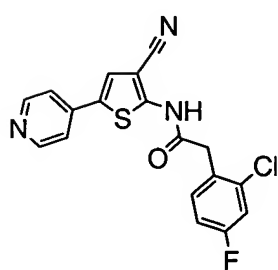
I-A-16



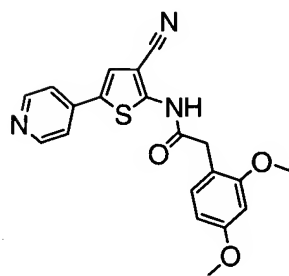
I-A-17



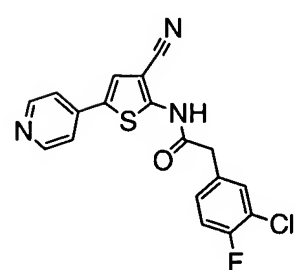
I-A-18



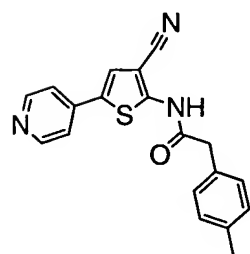
I-A-19



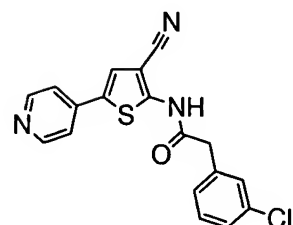
I-A-20



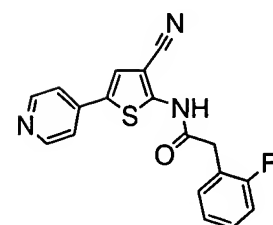
I-A-21



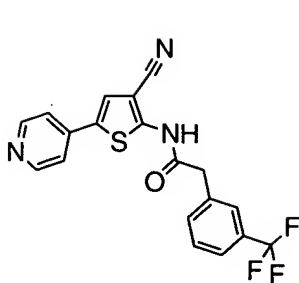
I-A-22



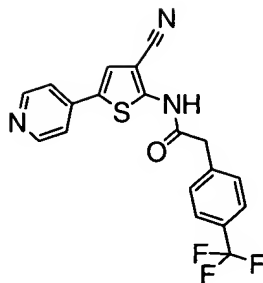
I-A-23



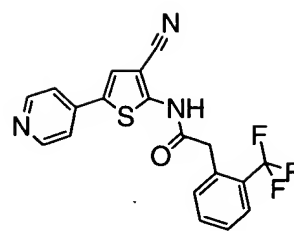
I-A-24



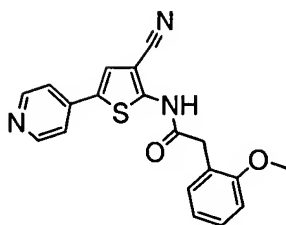
I-A-25



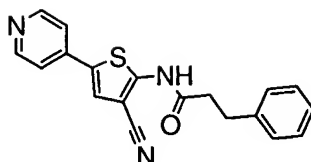
I-A-26



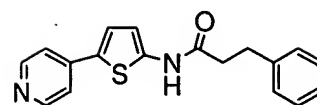
I-A-27



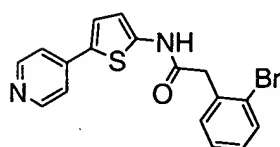
I-A-28



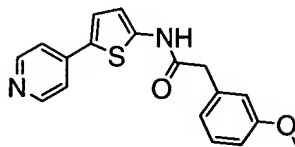
I-A-29



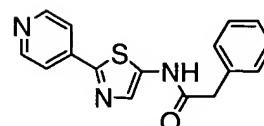
I-A-30



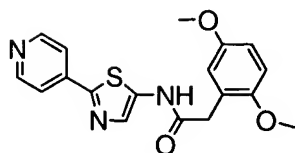
I-A-31



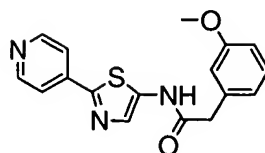
I-A-32



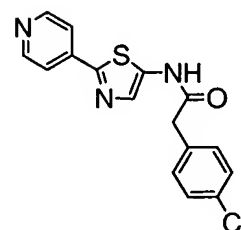
I-A-33



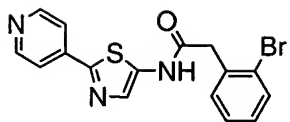
I-A-34



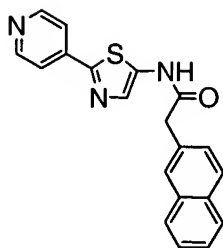
I-A-35



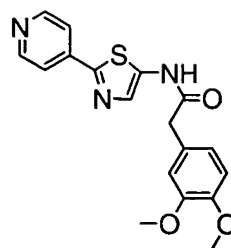
I-A-36



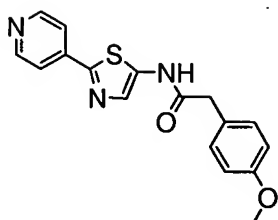
I-A-37



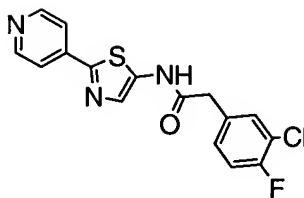
I-A-38



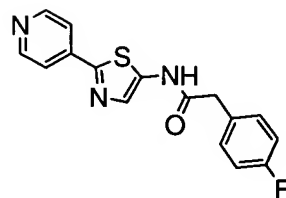
I-A-39



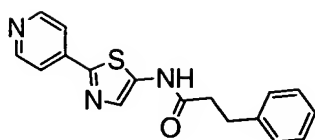
I-A-40



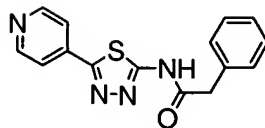
I-A-41



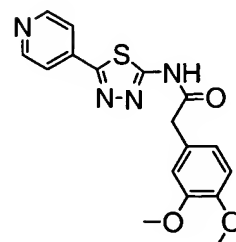
I-A-42



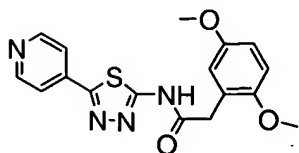
I-A-43



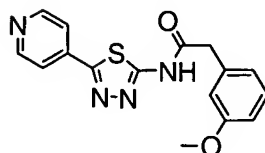
I-A-44



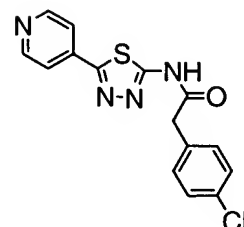
I-A-45



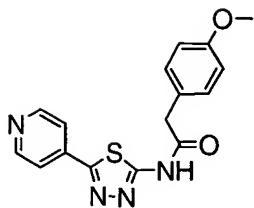
I-A-46



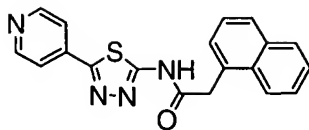
I-A-47



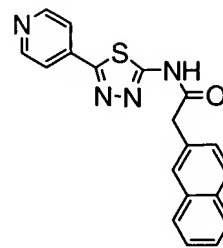
I-A-48



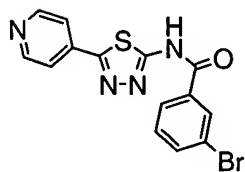
I-A-49



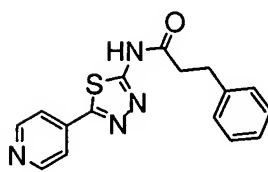
I-A-50



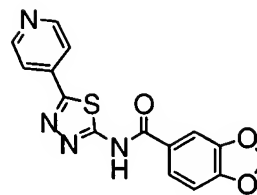
I-A-51



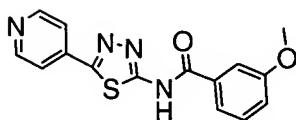
I-A-52



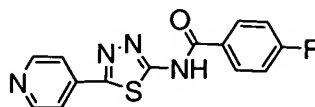
I-A-53



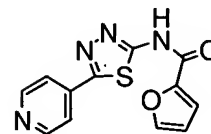
I-A-54



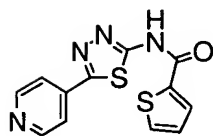
I-A-55



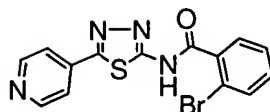
I-A-56



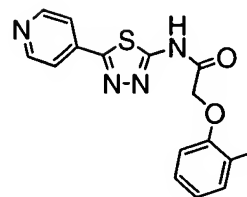
I-A-57



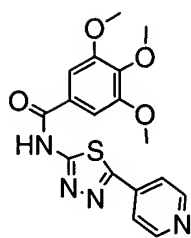
I-A-58



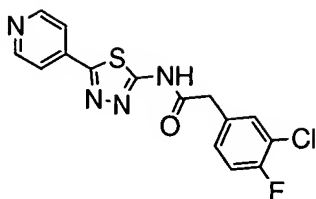
I-A-59



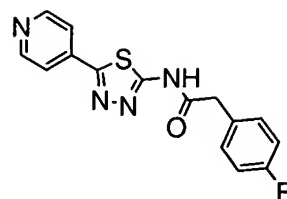
I-A-60



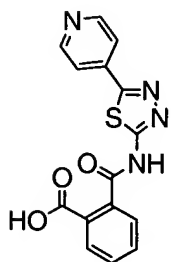
I-A-61



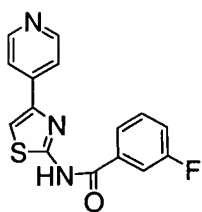
I-A-62



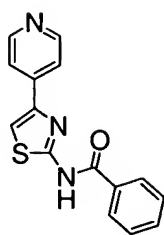
I-A-63



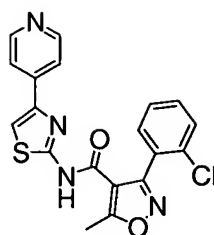
I-A-64



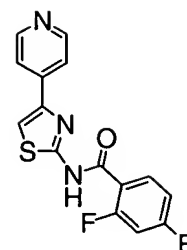
I-B-1



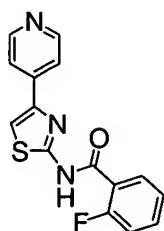
I-B-2



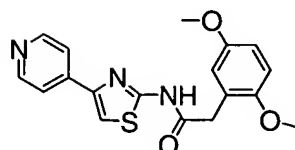
I-B-3



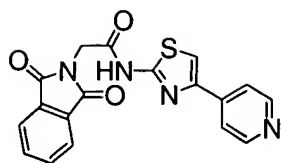
I-B-4



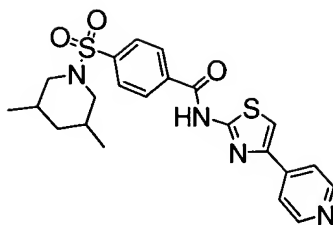
I-B-5



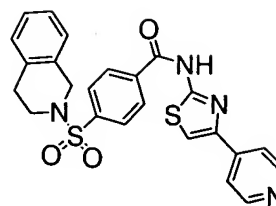
I-B-6



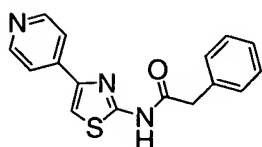
I-B-11



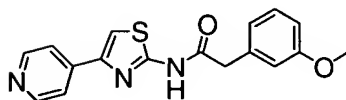
I-B-12



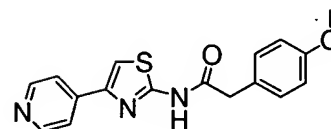
I-B-13



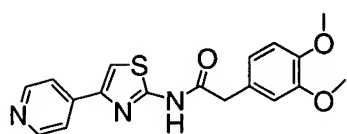
I-B-19



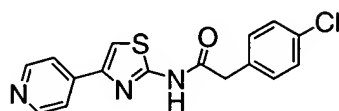
I-B-20



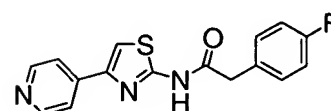
I-B-21



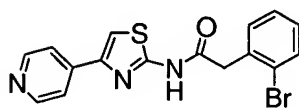
I-B-22



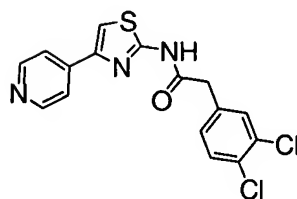
I-B-23



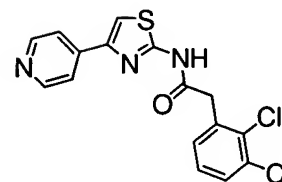
I-B-24



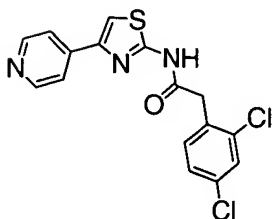
I-B-25



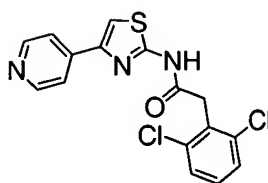
I-B-26



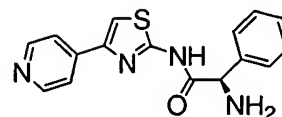
I-B-27



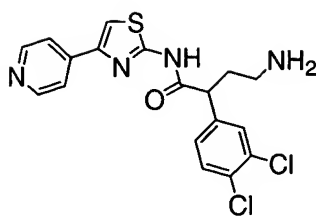
I-B-28



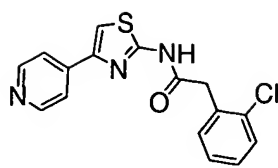
I-B-29



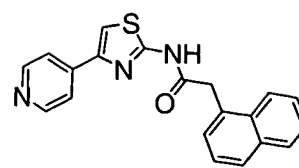
I-B-30



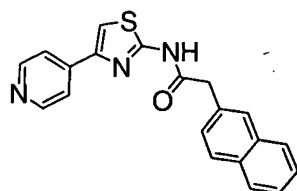
I-B-31



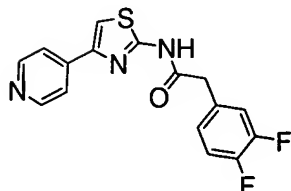
I-B-32



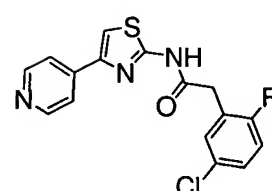
I-B-33



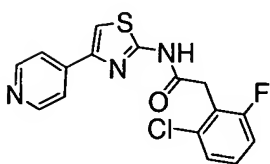
I-B-34



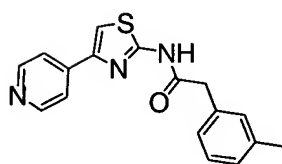
I-B-35



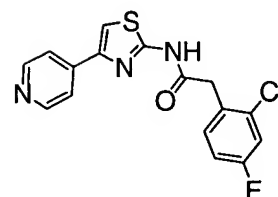
I-B-36



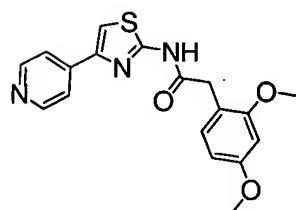
I-B-37



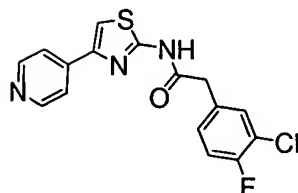
I-B-38



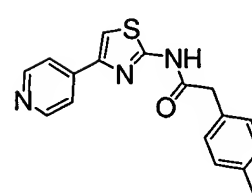
I-B-39



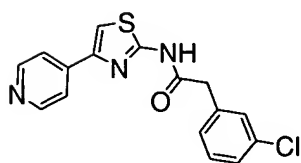
I-B-40



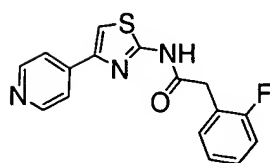
I-B-41



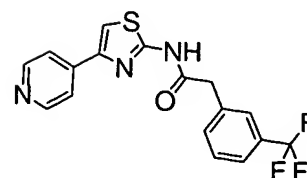
I-B-42



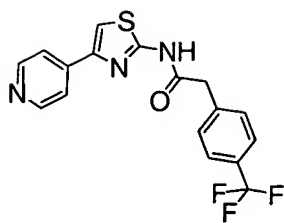
I-B-43



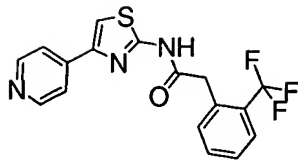
I-B-44



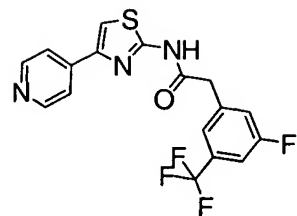
I-B-45



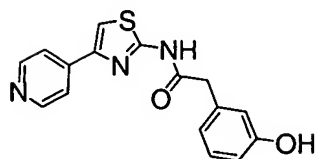
I-B-46



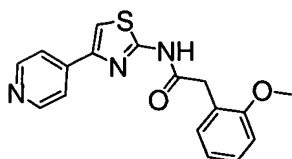
I-B-47



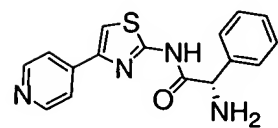
I-B-48



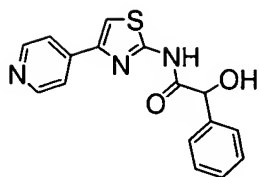
I-B-49



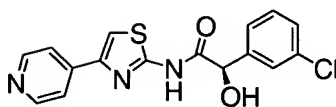
I-B-50



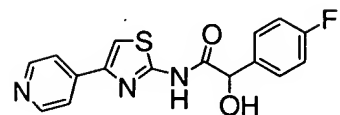
I-B-51



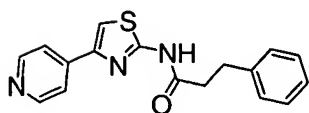
I-B-52



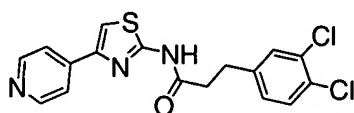
I-B-53



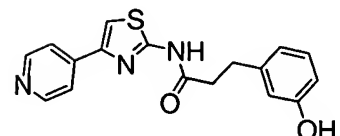
I-B-54



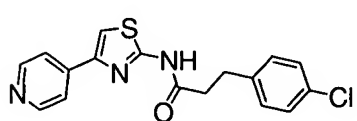
I-B-55



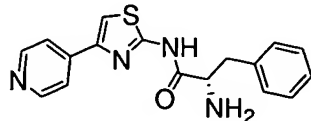
I-B-56



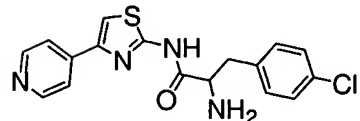
I-B-57



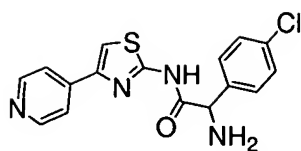
I-B-58



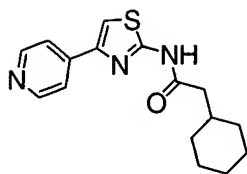
I-B-59



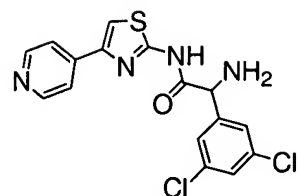
I-B-60



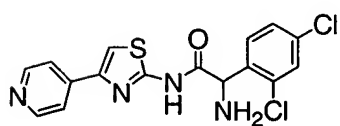
I-B-61



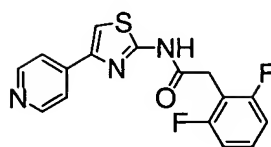
I-B-62



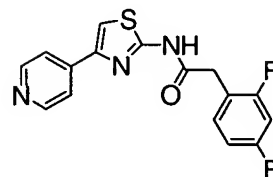
I-B-63



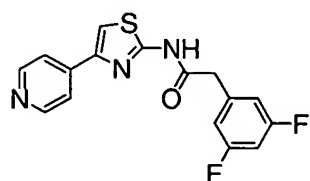
I-B-64



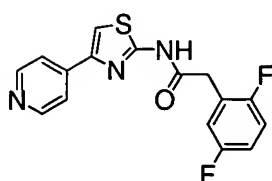
I-B-65



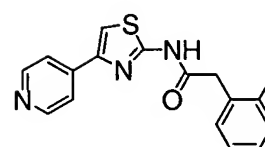
I-B-66



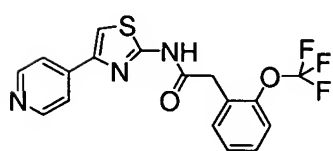
I-B-67



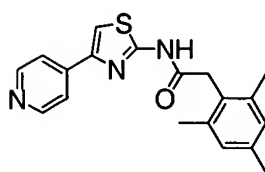
I-B-68



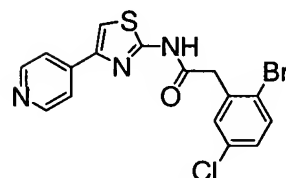
I-B-69



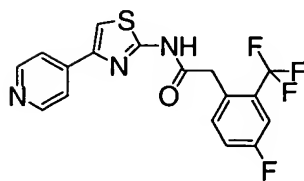
I-B-70



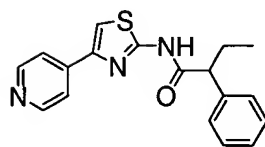
I-B-71



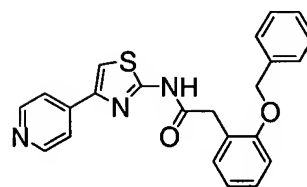
I-B-72



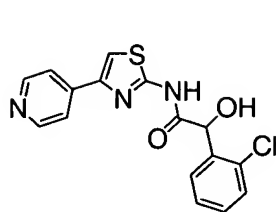
I-B-73



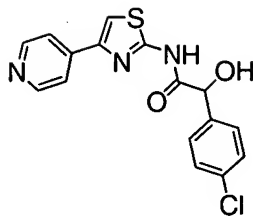
I-B-74



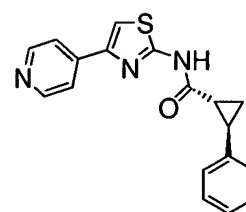
I-B-75



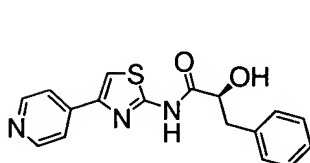
I-B-76



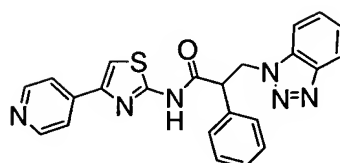
I-B-77



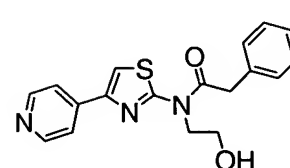
I-B-78



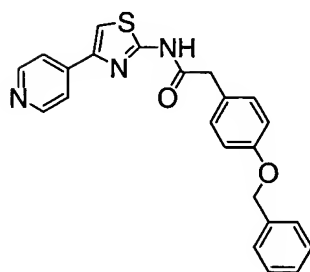
I-B-79



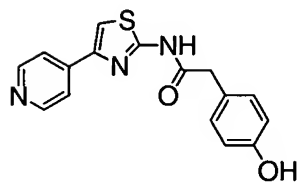
I-B-80



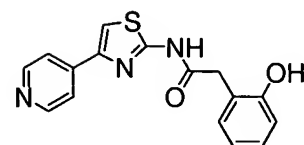
I-B-81



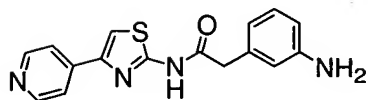
I-B-82



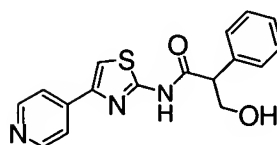
I-B-83



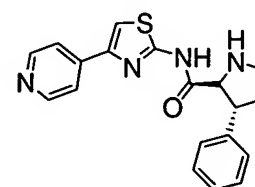
I-B-84



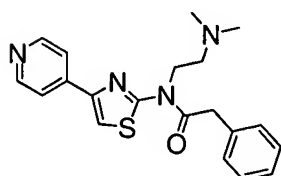
I-B-85



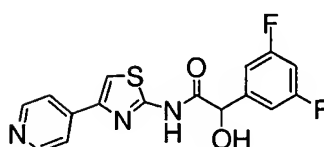
I-B-86



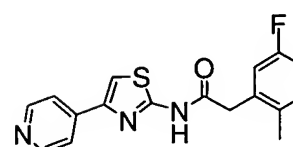
I-B-87



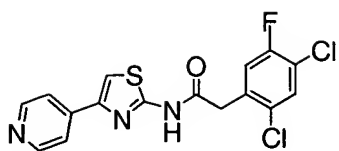
I-B-88



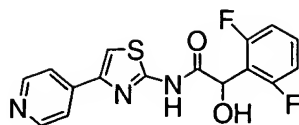
I-B-89



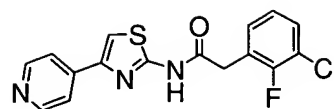
I-B-90



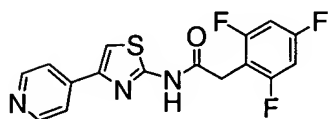
I-B-91



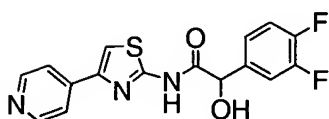
I-B-92



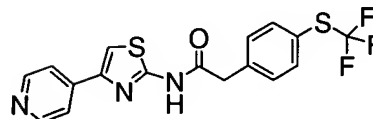
I-B-93



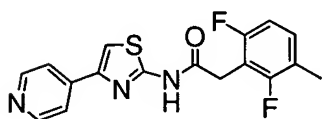
I-B-94



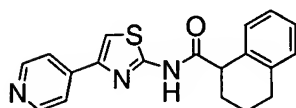
I-B-95



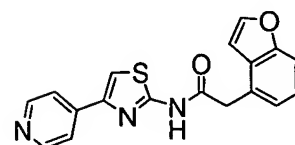
I-B-96



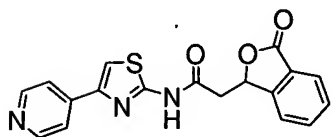
I-B-97



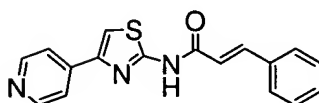
I-B-98



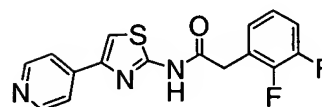
I-B-99



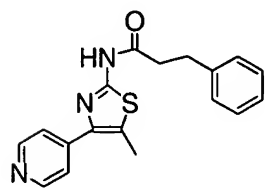
I-B-100



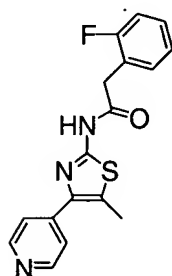
I-B-101



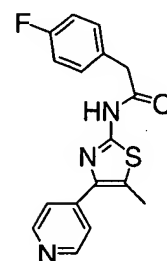
I-B-102



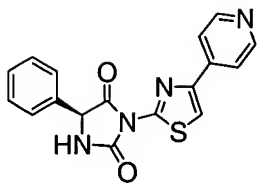
I-B-103



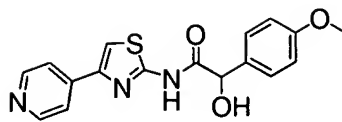
I-B-104



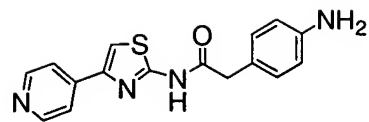
I-B-105



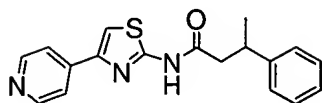
I-B-106



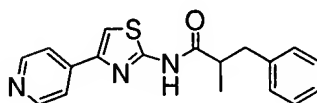
I-B-107



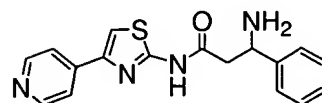
I-B-108



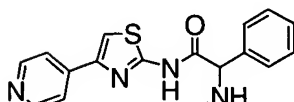
I-B-109



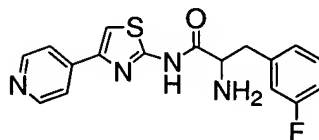
I-B-110



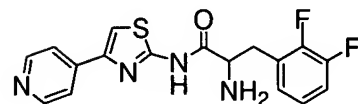
I-B-111



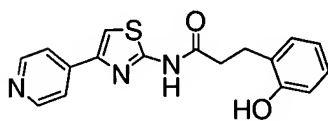
I-B-112



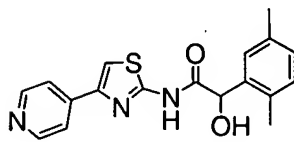
I-B-113



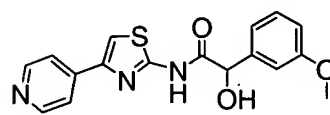
I-B-114



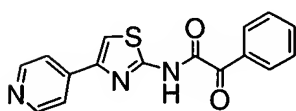
I-B-115



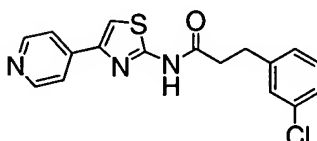
I-B-116



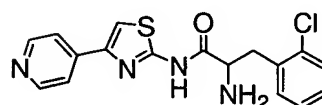
I-B-117



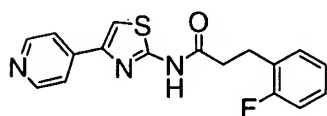
I-B-118



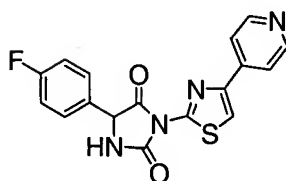
I-B-119



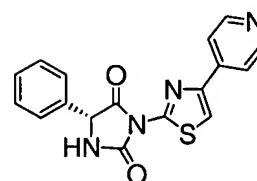
I-B-120



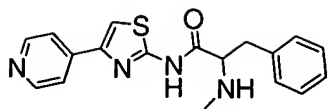
I-B-121



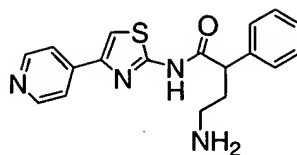
I-B-122



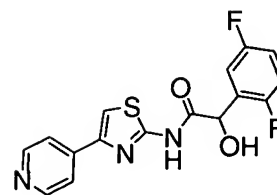
I-B-123



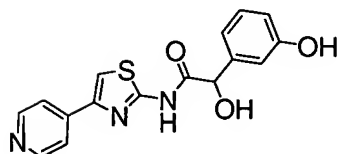
I-B-124



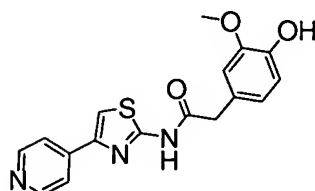
I-B-125



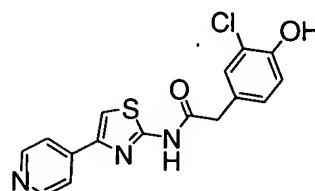
I-B-126



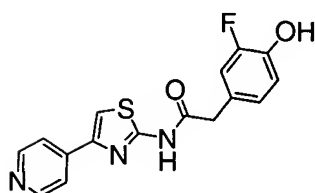
I-B-127



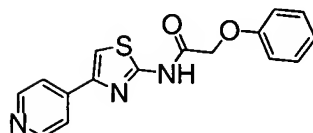
I-B-128



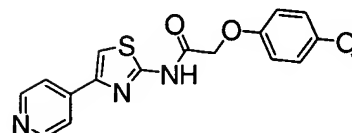
I-B-129



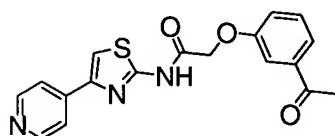
I-B-130



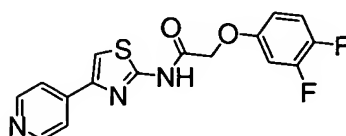
I-B-131



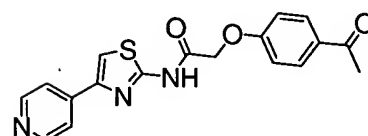
I-B-132



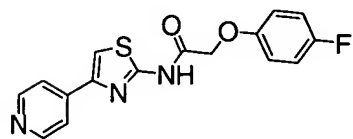
I-B-133



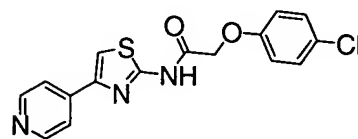
I-B-134



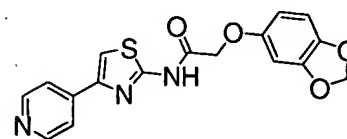
I-B-135



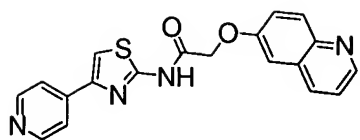
I-B-136



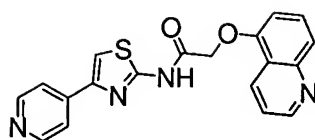
I-B-137



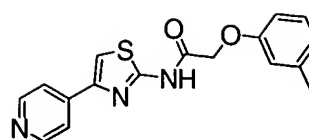
I-B-138



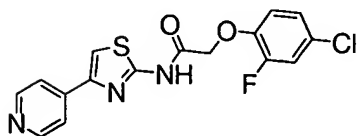
I-B-139



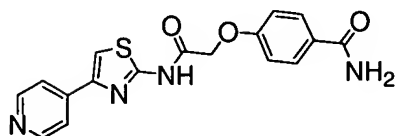
I-B-40



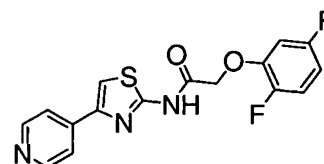
I-B-141



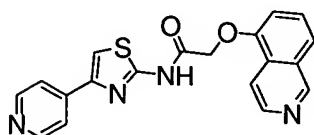
I-B-142



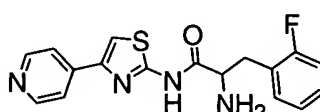
I-B-143



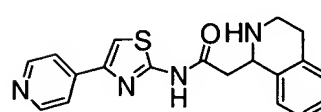
I-B-144



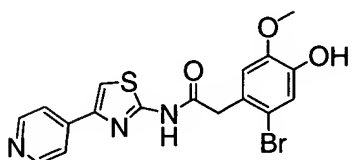
I-B-145



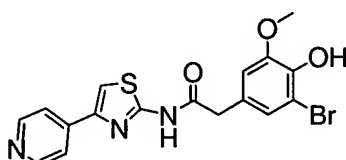
I-B-146



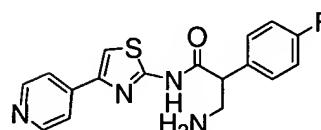
I-B-147



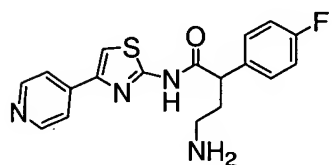
I-B-148



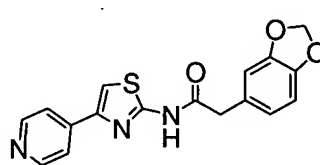
I-B-149



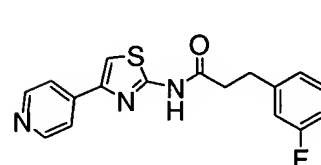
I-B-150



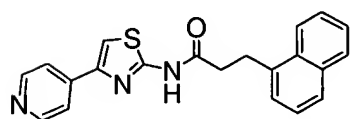
I-B-151



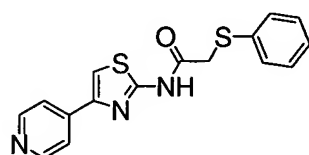
I-B-152



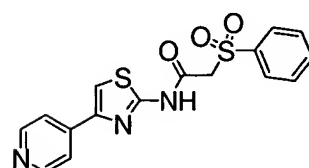
I-B-153



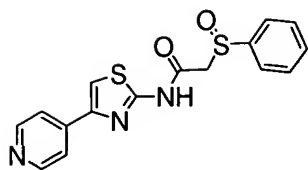
I-B-154



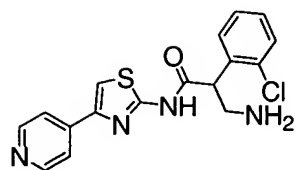
I-B-155



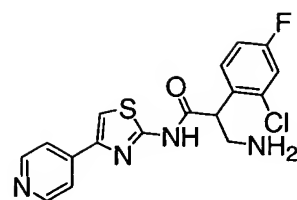
I-B-156



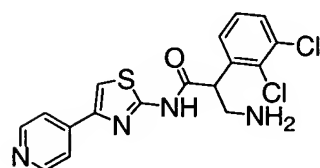
I-B-157



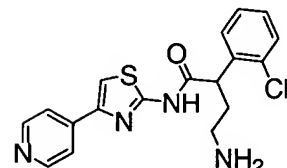
I-B-158



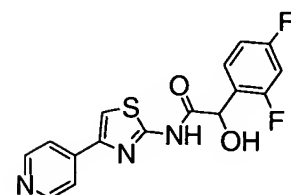
I-B-159



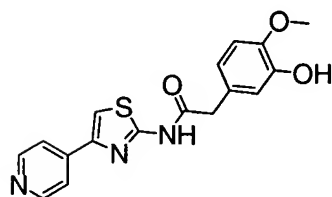
I-B-160



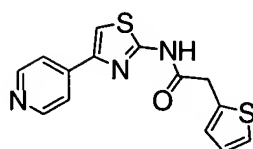
I-B-161



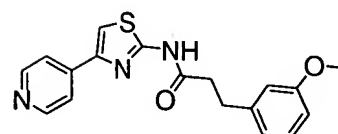
I-B-162



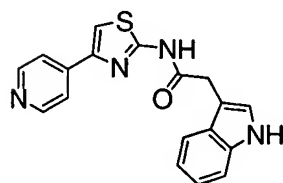
I-B-163



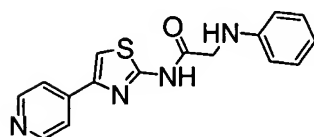
I-B-164



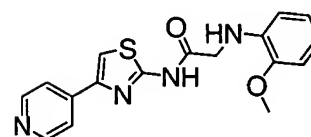
I-B-165



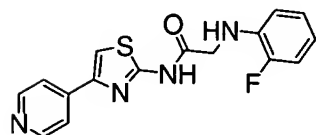
I-B-166



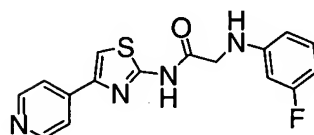
I-B-167



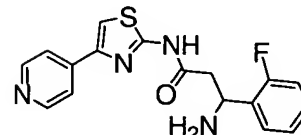
I-B-168



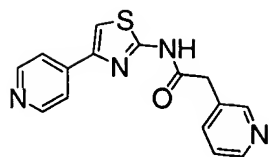
I-B-169



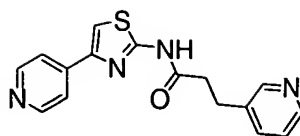
I-B-170



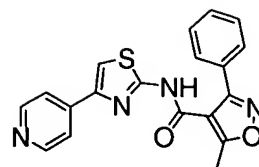
I-B-171



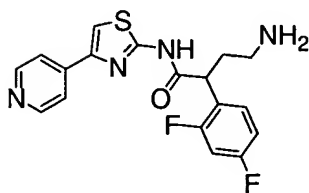
I-B-172



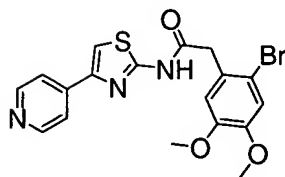
I-B-173



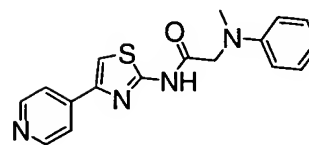
I-B-174



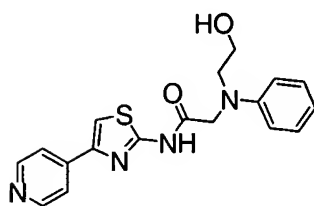
I-B-175



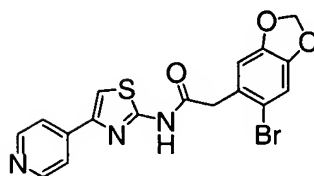
I-B-176



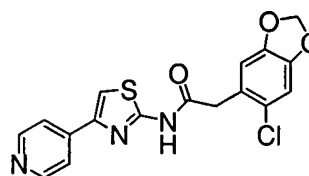
I-B-177



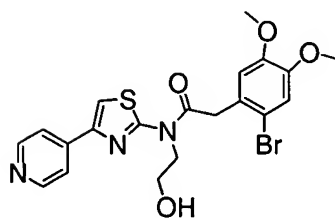
I-B-178



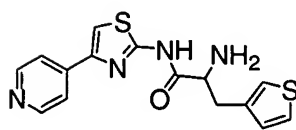
I-B-179



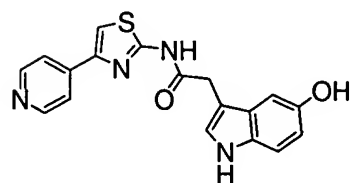
I-B-180



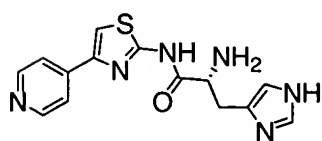
I-B-181



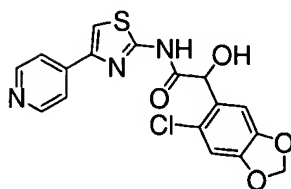
I-B-182



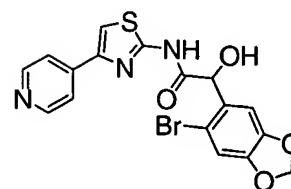
I-B-183



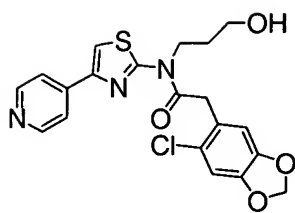
I-B-184



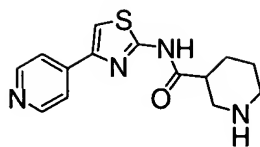
I-B-185



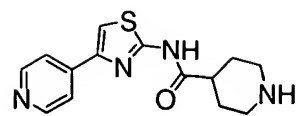
I-B-186



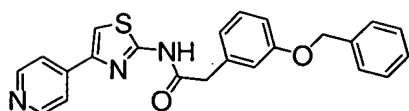
I-B-187



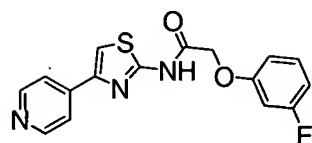
I-B-188



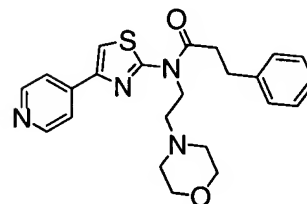
I-B-189



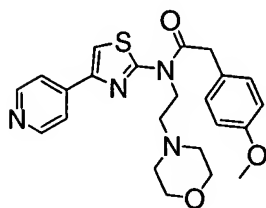
I-B-190



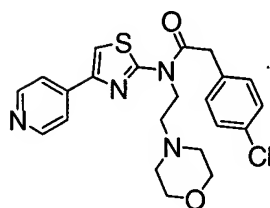
I-B-191



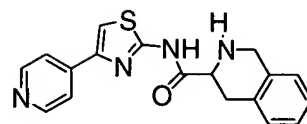
I-B-192



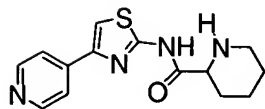
I-B-193



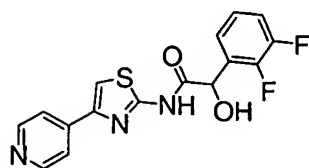
I-B-194



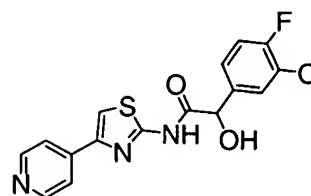
I-B-195



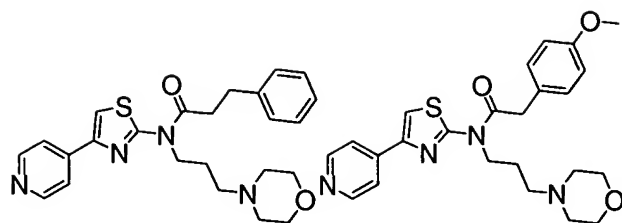
I-B-196



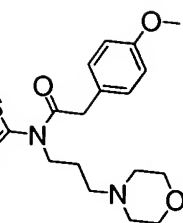
I-B-197



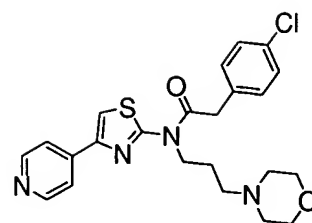
I-B-198



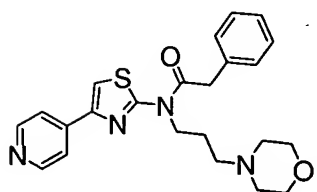
I-B-199



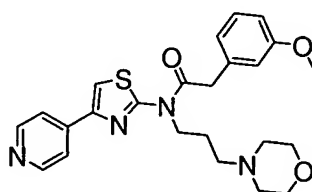
I-B-200



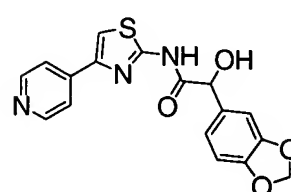
I-B-201



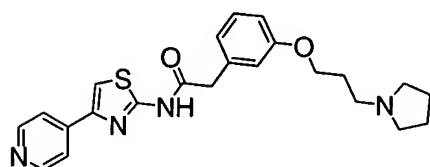
I-B-202



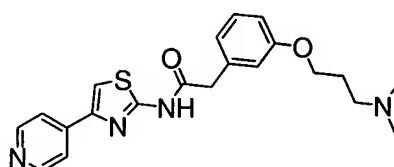
I-B-203



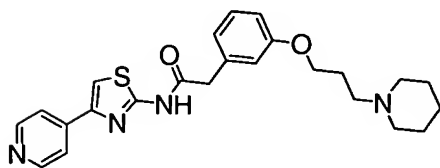
I-B-204



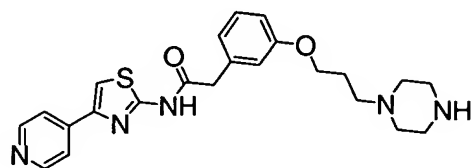
I-B-205



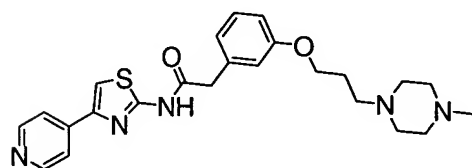
I-B-206



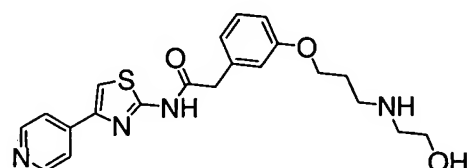
I-B-207



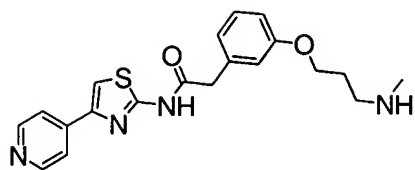
I-B-208



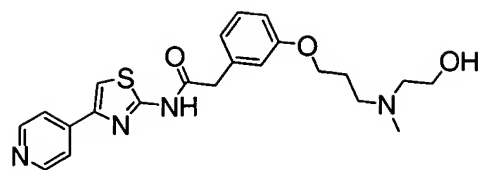
I-B-209



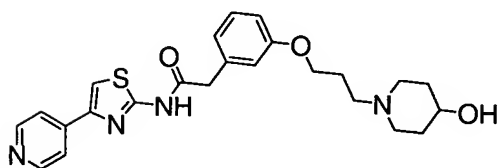
I-B-210



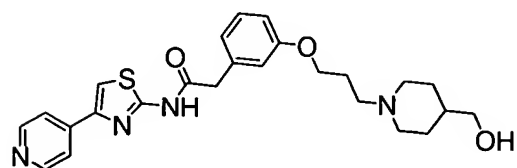
I-B-211



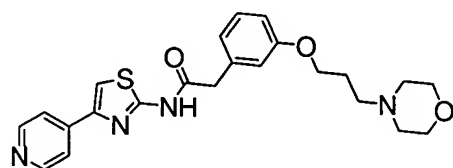
I-B-212



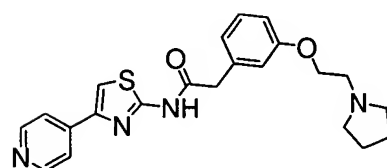
I-B-213



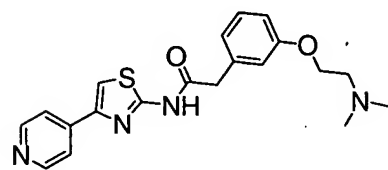
I-B-214



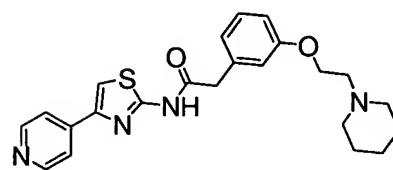
I-B-215



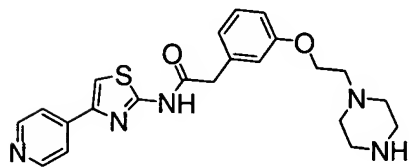
I-B-216



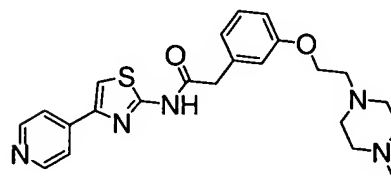
I-B-217



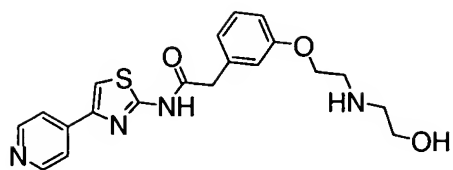
I-B-218



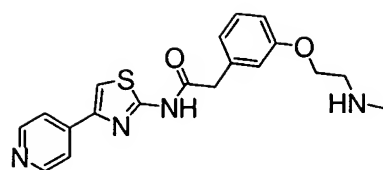
I-B-219



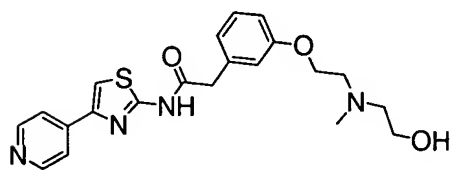
I-B-220



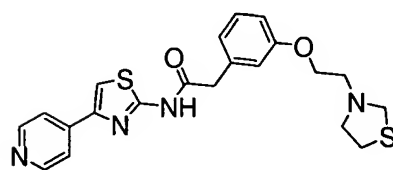
I-B-221



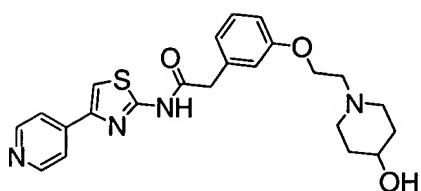
I-B-222



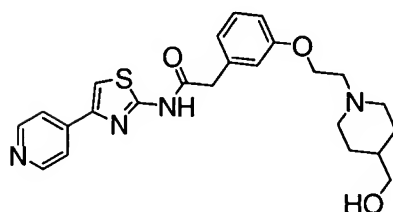
I-B-223



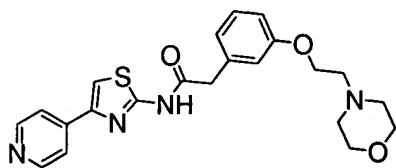
I-B-224



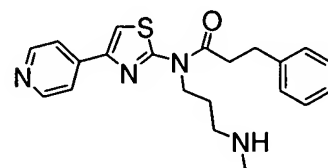
I-B-225



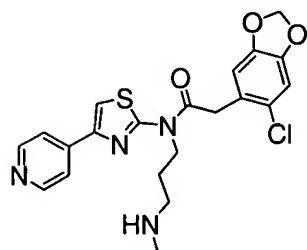
I-B-226



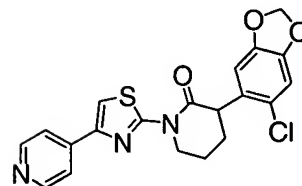
I-B-227



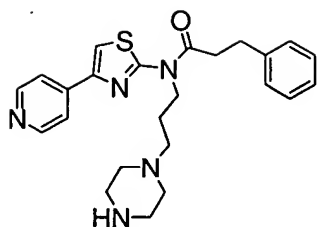
I-B-228



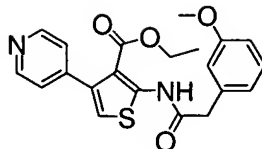
I-B-229



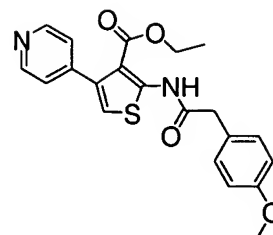
I-B-230



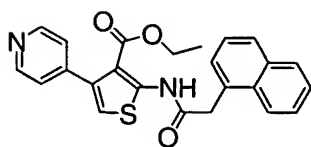
I-B-231



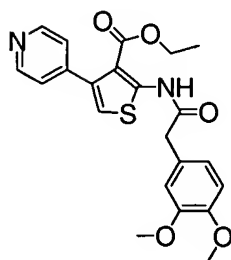
I-B-232



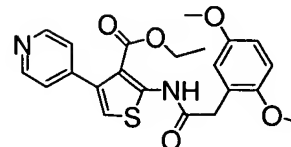
I-B-233



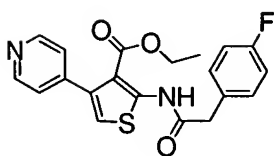
I-B-234



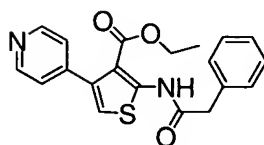
I-B-235



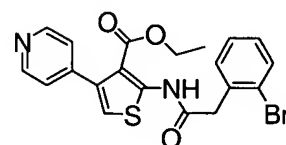
I-B-236



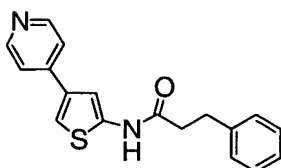
I-B-237



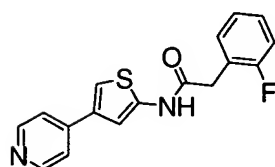
I-B-238



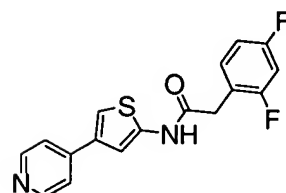
I-B-239



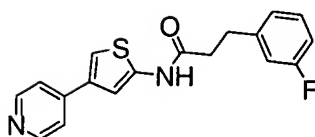
I-B-240



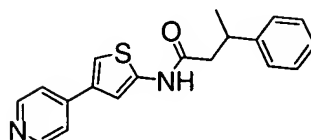
I-B-241



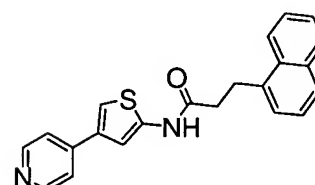
I-B-242



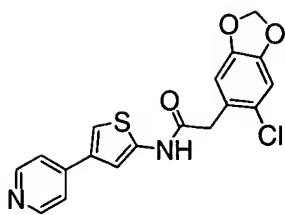
I-B-243



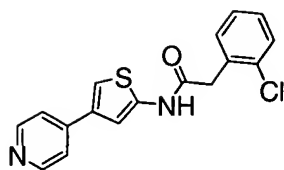
I-B-244



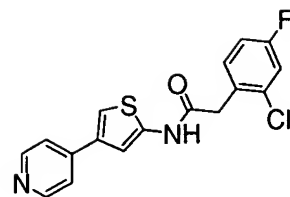
I-B-245



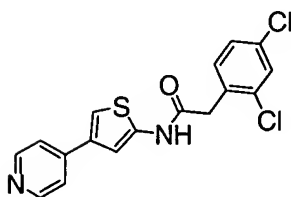
I-B-246



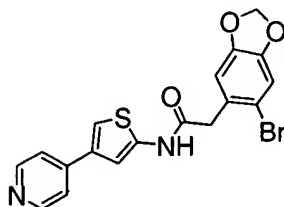
I-B-247



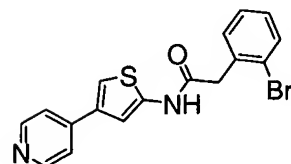
I-B-248



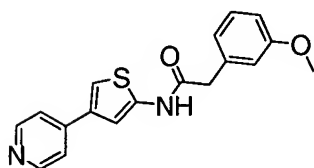
I-B-249



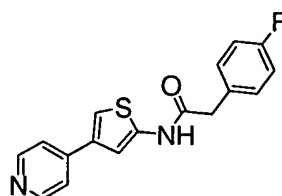
I-B-250



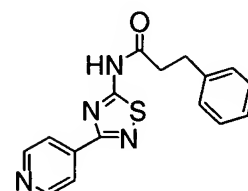
I-B-251



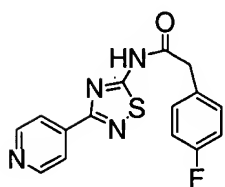
I-B-252



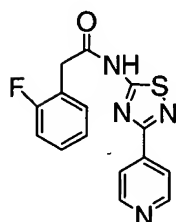
I-B-253



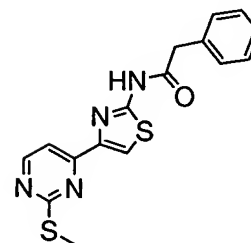
I-B-254



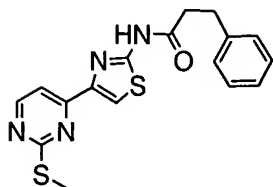
I-B-255



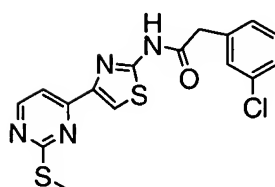
I-B-256



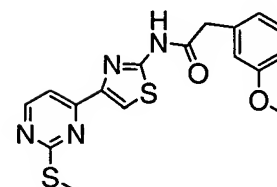
I-B-257



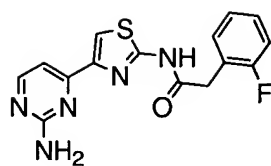
I-B-258



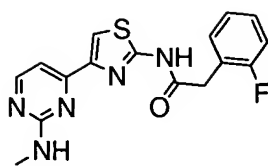
I-B-259



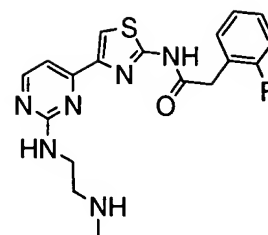
I-B-260



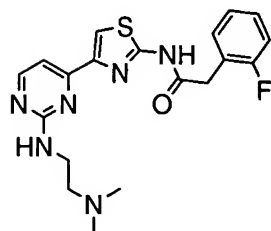
I-B-261



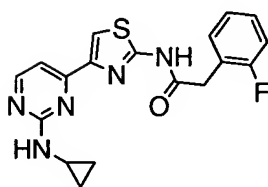
I-B-262



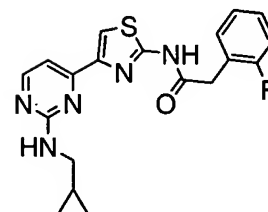
I-B-263



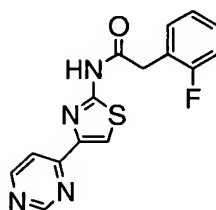
I-B-264



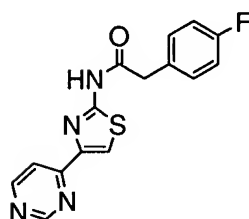
I-B-265



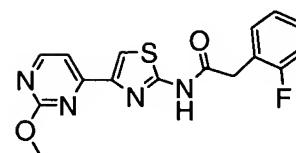
I-B-266



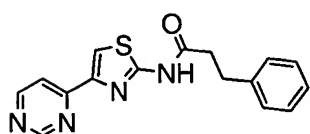
I-B-267



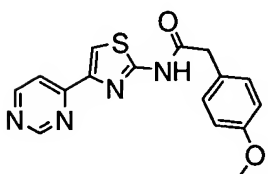
I-B-268



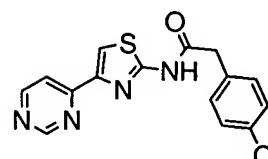
I-B-269



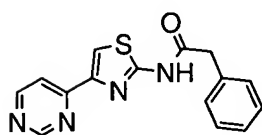
I-B-270



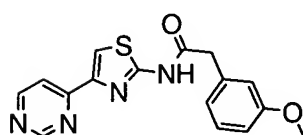
I-B-271



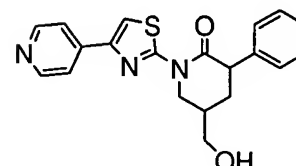
I-B-272



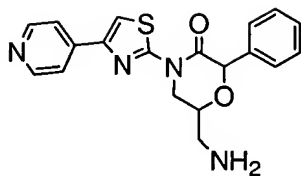
I-B-273



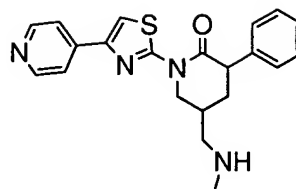
I-B-274



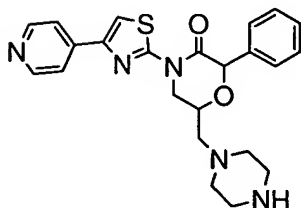
I-B-275



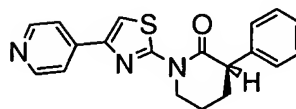
I-B-276



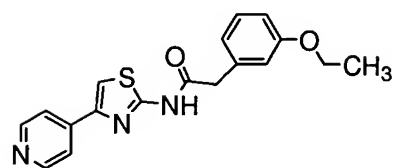
I-B-277



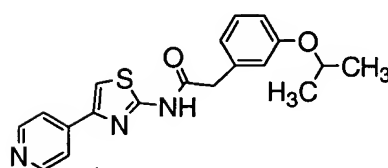
I-B-278



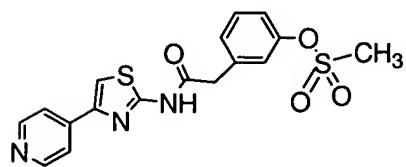
I-B-279



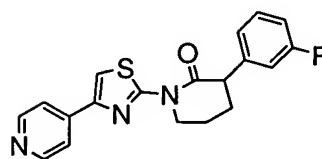
I-B-280



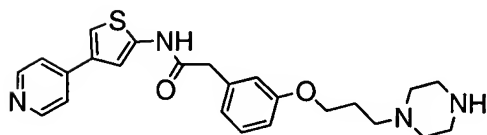
I-B-281



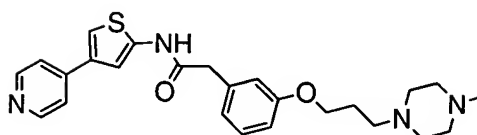
I-B-282



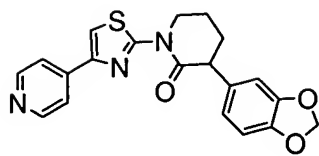
I-B-283



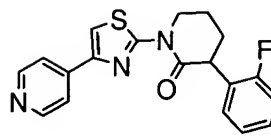
I-B-284



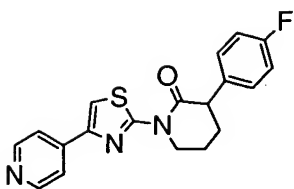
I-B-285



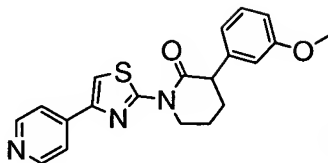
I-B-286



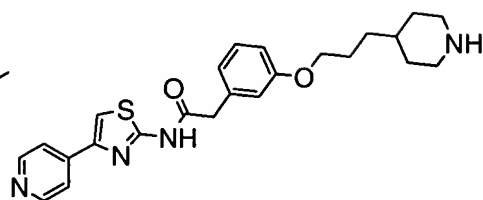
I-B-287



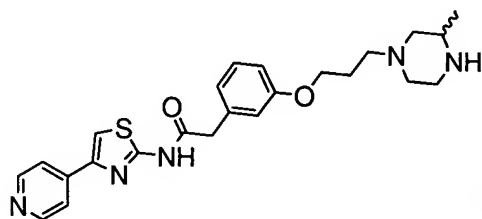
I-B-288



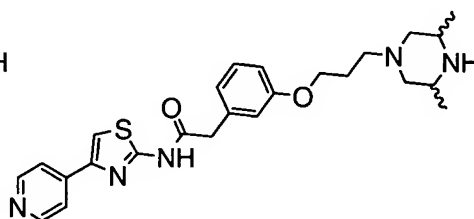
I-B-289



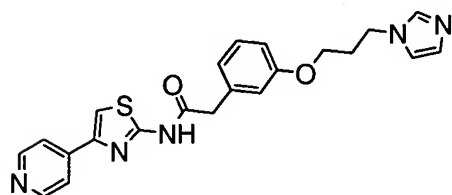
I-B-290



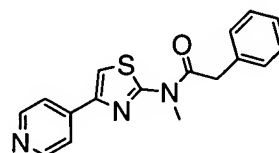
I-B-291



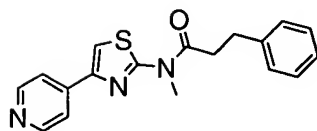
I-B-292



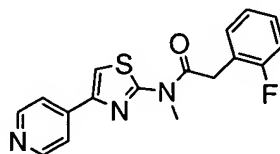
I-B-293



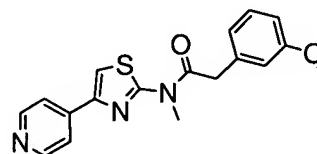
I-B-294



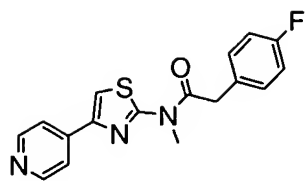
I-B-295



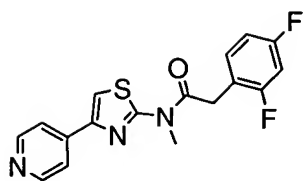
I-B-296



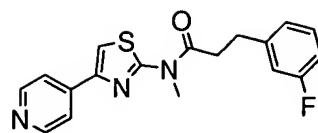
I-B-297



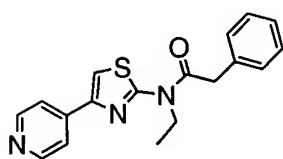
I-B-298



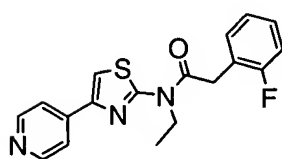
I-B-299



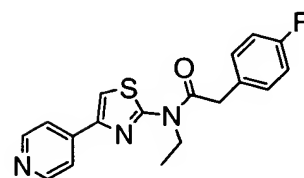
I-B-300



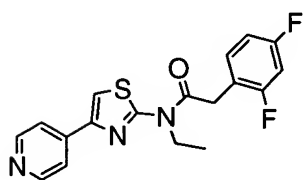
I-B-301



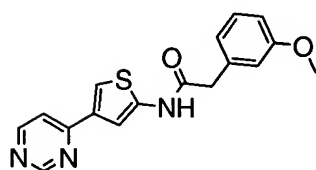
I-B-302



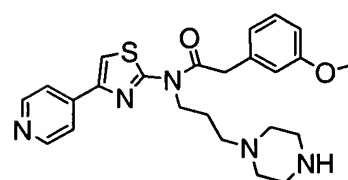
I-B-303



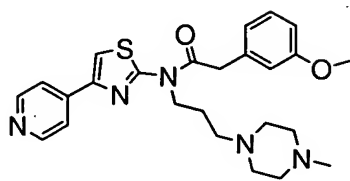
I-B-304



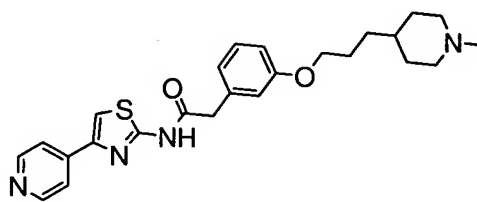
I-B-305



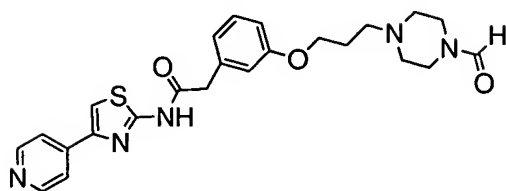
I-B-306



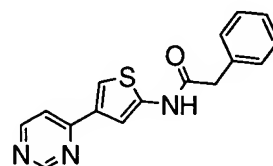
I-B-307



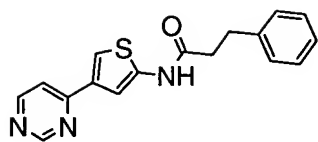
I-B-308



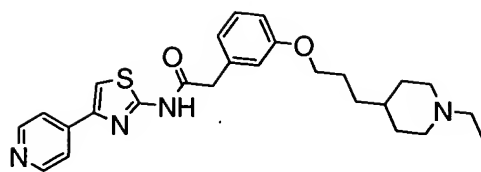
I-B-309



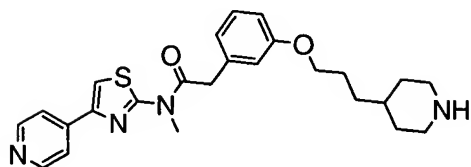
I-B-310



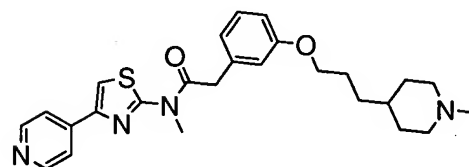
I-B-311



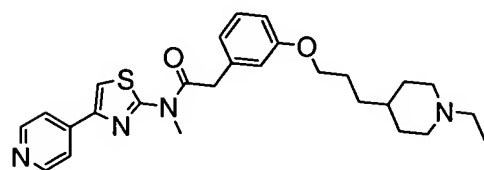
I-B-312



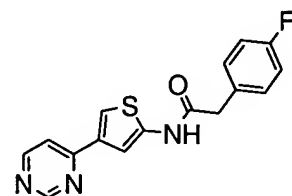
I-B-313



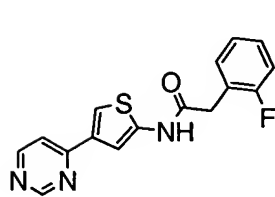
I-B-314



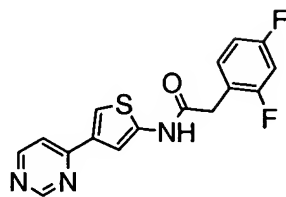
I-B-315



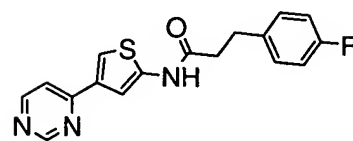
I-B-316



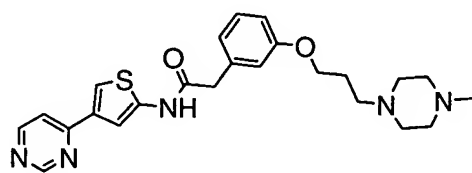
I-B-317



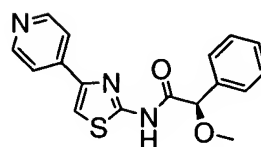
I-B-318



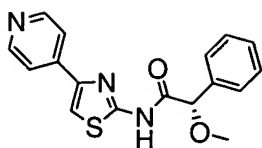
I-B-319



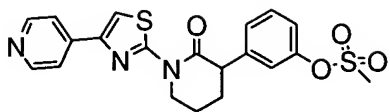
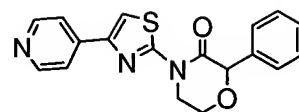
I-B-320



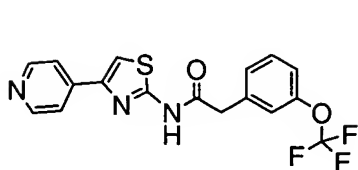
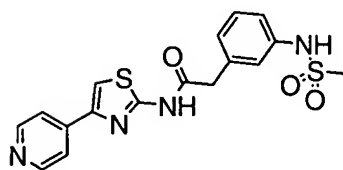
I-B-321



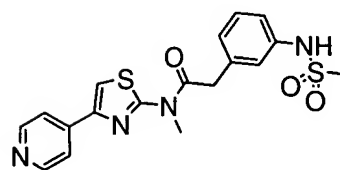
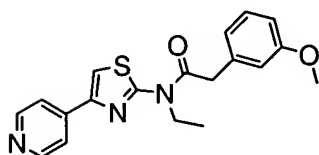
I-B-322

**I-B-323**

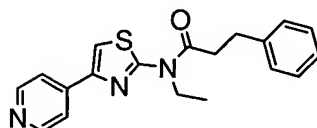
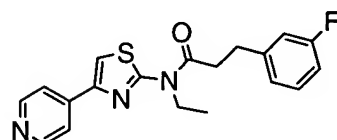
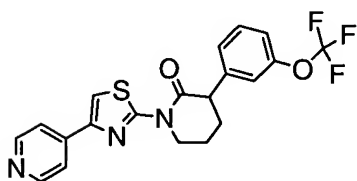
I-B-324

**I-B-325**

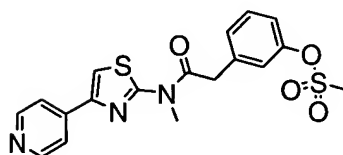
I-B-326

**I-B-327**

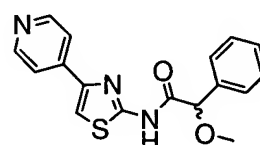
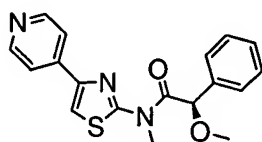
I-B-328

**I-B-329****I-B-330**

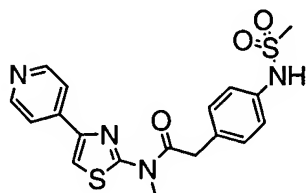
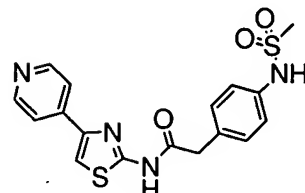
I-B-331



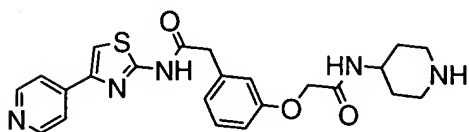
I-B-332

**I-B-333**

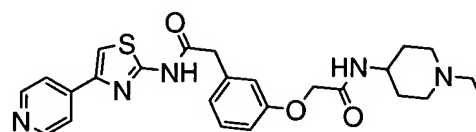
I-B-334

**I-B-335**

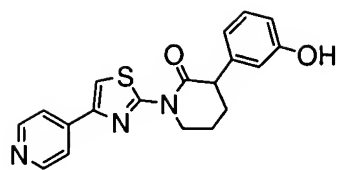
I-B-336



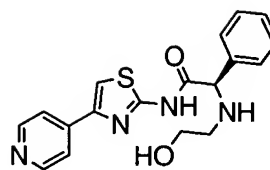
I-B-337



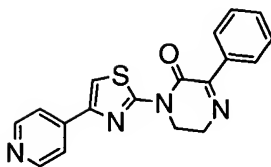
I-B-338



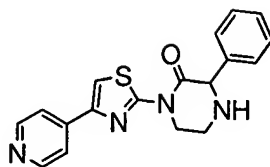
I-B-339



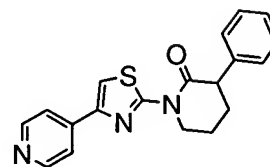
I-B-340



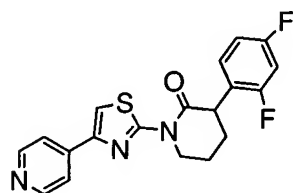
I-B-341



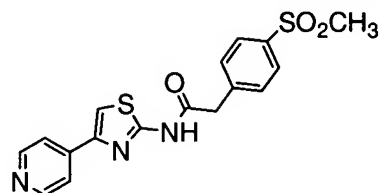
I-B-342



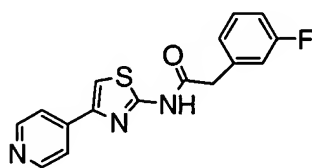
I-B-343



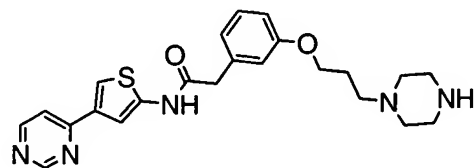
I-B-344



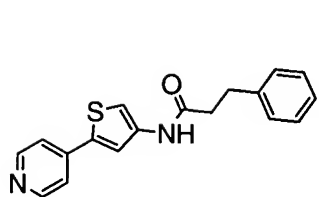
I-B-345



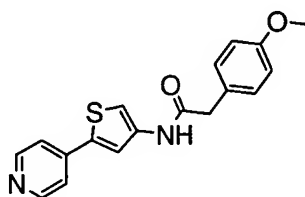
I-B-346



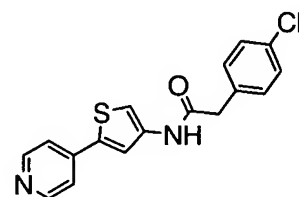
I-B-347



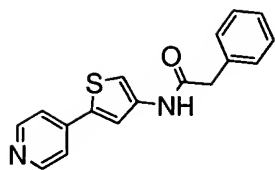
I-C-1



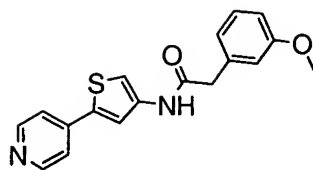
I-C-2



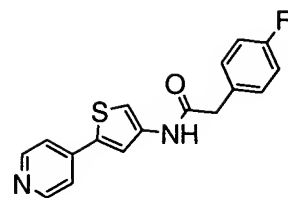
I-C-3



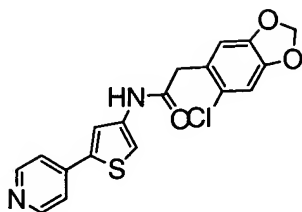
I-C-4



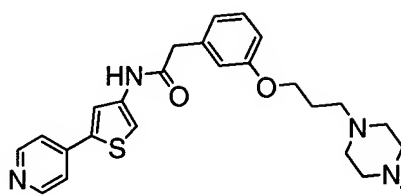
I-C-5



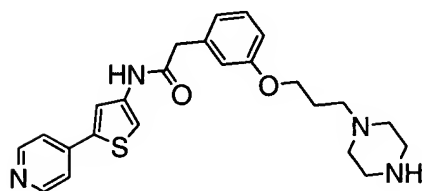
I-C-6



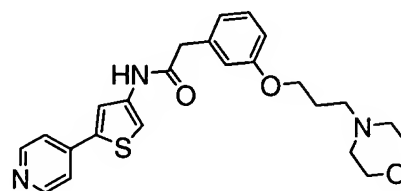
I-C-7



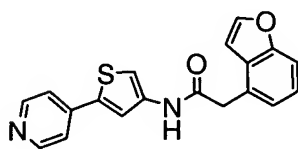
I-C-8



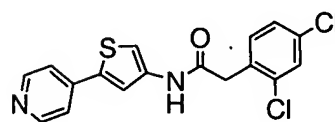
I-C-9



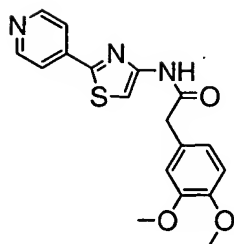
I-C-10



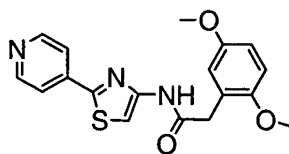
I-C-11



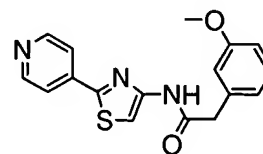
I-C-12



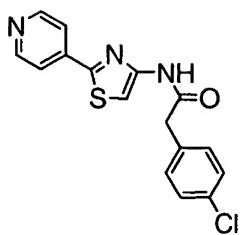
I-C-13



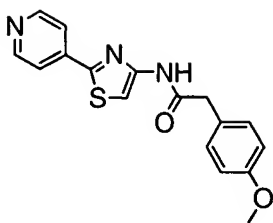
I-C-14



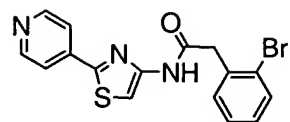
I-C-15



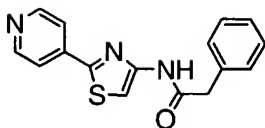
I-C-16



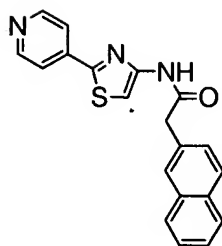
I-C-17



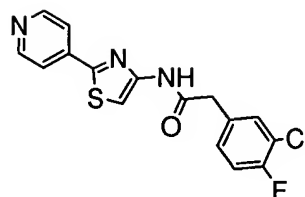
I-C-18



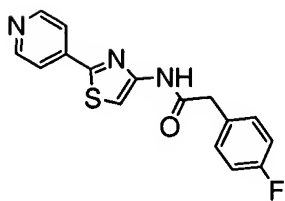
I-C-19



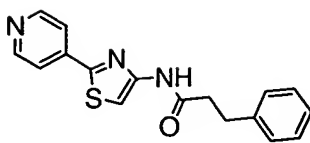
I-C-20



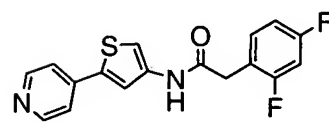
I-C-21



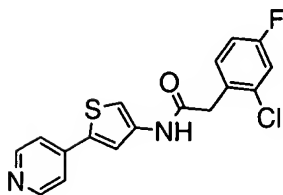
I-C-22



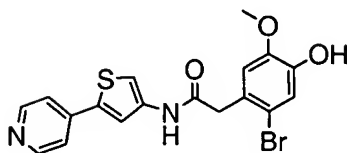
I-C-23



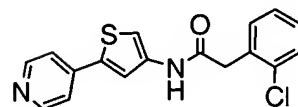
I-C-24



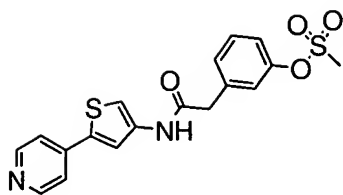
I-C-25



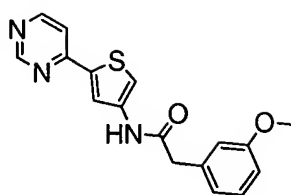
I-C-26



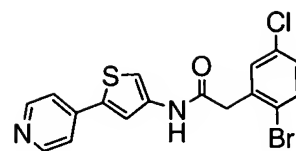
I-C-27



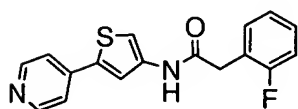
I-C-28



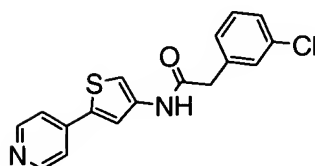
I-C-29



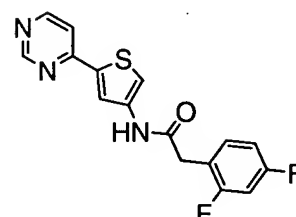
I-C-30



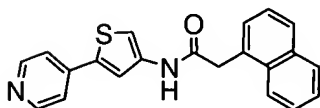
I-C-31



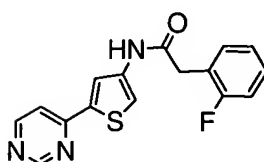
I-C-32



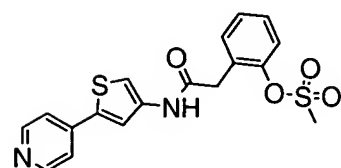
I-C-33



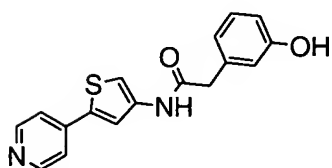
I-C-34



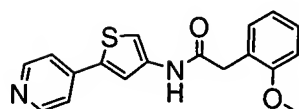
I-C-35



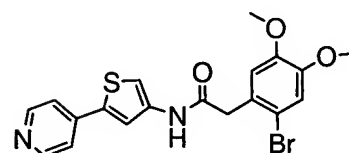
I-C-36



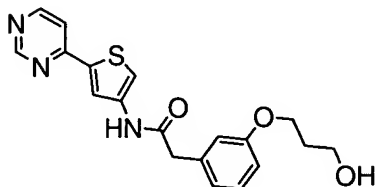
I-C-37



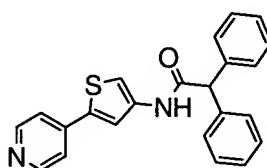
I-C-38



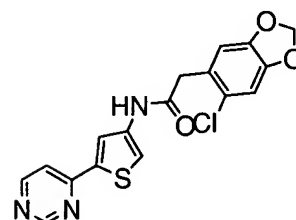
I-C-39



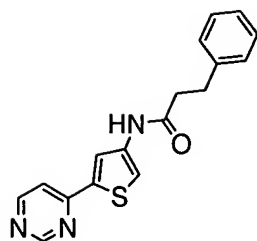
I-C-40



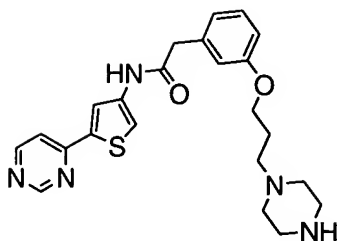
I-C-41



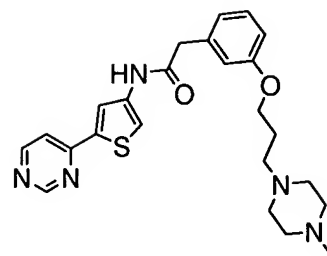
I-C-42



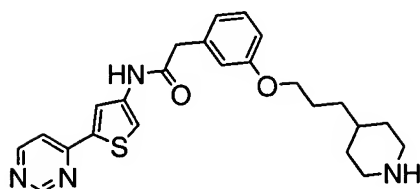
I-C-43



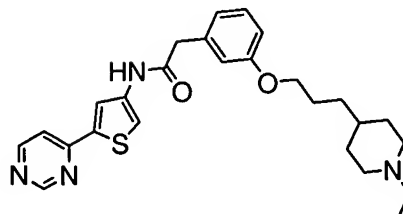
I-C-44



I-C-45



I-C-46



I-C-47

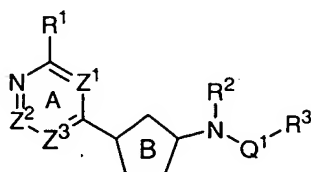
46. A composition comprising an effective amount of compound of claim 1, and a pharmaceutically acceptable carrier, adjuvant, or vehicle.

47. The composition of claim 46, additionally comprising a therapeutic agent selected from a chemotherapeutic or anti-proliferative agent, an anti-inflammatory agent, an immunomodulatory or immunosuppressive agent, a neurotrophic factor, an agent for treating cardiovascular disease, an agent for treating destructive bone disorders, an agent for treating liver disease, an anti-viral agent, an agent for treating blood disorders, an agent for treating diabetes, or an agent for treating immunodeficiency disorders.

48. A method of inhibiting ROCK, ERK, GSK, or AGC kinase activity in:

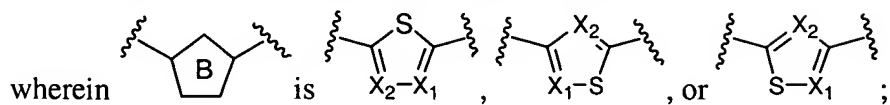
- (a) a patient; or
- (b) a biological sample;

which method comprises administering to said patient, or contacting said biological sample with a compound having the formula:



I

or a pharmaceutically acceptable salt thereof, wherein:



R^1 is halogen, CN, NO_2 , or V_mR ;

Z^1 and Z^3 are each independently N or CR^Z , and Z^2 is N or CR^1 , provided that Z^1 , Z^2 and Z^3 are not simultaneously N;

each occurrence of R^Z is independently halogen, CN, NO_2 , or U_nR' ;

R^2 is U_nR' ;

X^1 and X^2 are each independently CR^4 or N;

each occurrence of R^4 is independently halogen, CN, NO_2 , or V_mR ;

each occurrence of U or V is independently an optionally substituted C_{1-6} alkylidene chain, wherein up to two methylene units of the chain are optionally and independently replaced by $-NR-$, $-S-$, $-O-$, $-CS-$, $-CO_2-$, $-OCO-$, $-CO-$, $-COCO-$, $-CONR-$, $-NRCO-$, $-NRCO_2-$, $-SO_2NR-$, $-NRSO_2-$, $-CONRNR-$, $-NRCONR-$, $-OCONR-$, $-NRNR-$, $-NRSO_2NR-$, $-SO-$, $-SO_2-$, $-PO-$, $-PO_2-$, or $-POR-$;

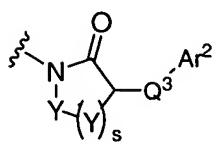
m and n are each independently 0 or 1;

each occurrence of R is independently hydrogen or an optionally substituted C_{1-6} aliphatic group; and each occurrence of R' is independently hydrogen or an optionally substituted C_{1-6} aliphatic group, a 3-8-membered saturated, partially unsaturated, or fully unsaturated monocyclic ring having 0-3 heteroatoms independently selected from nitrogen, oxygen, or sulfur, or an 8-12 membered saturated, partially unsaturated, or fully unsaturated bicyclic ring system having 0-5 heteroatoms independently selected from nitrogen, oxygen, or sulfur; or R and R' , two occurrences of R, or two occurrences of R' , are taken together with the atom(s) to which they are bound to form an optionally substituted 3-12 membered saturated, partially unsaturated, or fully unsaturated monocyclic or bicyclic ring having 0-4 heteroatoms independently selected from nitrogen, oxygen, or sulfur;

Q^1 is $-CO-$, $-SO_2-$, $-CONR-$, or $-SO_2NR-$;

R^3 is Q^2-Ar^1 ,

or R^2 and Q^1-R^3 , taken together with the nitrogen atom, form the cyclic group:



, where s is 1 or 2, each occurrence of Y is independently, as valency and stability permit, $-CO-$, $-CS-$, $-SO_2-$, $-O-$, $-S-$, $-NR^5-$, or $-C(R^5)_2-$, and R^5 is U_nR' ;

Q^2 and Q^3 are each independently a bond or a C_{1-6} alkylidene chain, wherein up to two methylene units of the chain are each optionally and independently replaced by $-NR'-$, $-S-$, $-O-$, $-CS-$, $-CO_2-$, $-OCO-$, $-CO-$, $-COCO-$, $-CONR'-$, $-NR'CO-$, $-NR'CO_2-$, $-SO_2NR'-$, $-NR'SO_2-$, $-CONR'NR'-$, $-NR'CONR'-$, $-OCONR'-$, $-NR'NR'-$, $-NR'SO_2NR'-$, $-SO-$, $-SO_2-$, $-PO-$, $-PO_2-$, or $-POR'-$; and wherein any carbon atom in the one or more methylene units is optionally substituted with one or two occurrences of R^6 , wherein each occurrence of R^6 is independently halogen, CN , NO_2 , or U_nR' , or two occurrences of R^6 , or R' and R^6 , taken together with the atoms to which they are bound, form an optionally substituted 3-6-membered cycloalkyl, heterocyclyl, aryl or heteroaryl ring; and

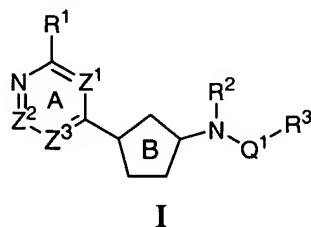
Ar^1 and Ar^2 are each independently a 5-8 membered saturated, partially unsaturated, or fully unsaturated monocyclic ring having 0-3 heteroatoms independently selected from nitrogen, oxygen, or sulfur, or an 8-12 membered saturated, partially unsaturated, or fully unsaturated bicyclic ring system having 0-5 heteroatoms independently selected from nitrogen, oxygen, or sulfur; wherein Ar^1 and Ar^2 are each optionally substituted with 0-5 independent occurrences of TR^7 ; wherein T is a bond or is a C_1-C_6 alkylidene chain wherein up to two methylene units of T are optionally and independently replaced by $-NR-$, $-S-$, $-O-$, $-CS-$, $-CO_2-$, $-OCO-$, $-CO-$, $-COCO-$, $-CONR-$, $-NRCO-$, $-NRCO_2-$, $-SO_2NR-$, $-NRSO_2-$, $-CONRNR-$, $-NRCONR-$, $-OCONR-$, $-NRNR-$, $-NRSO_2NR-$, $-SO-$, $-SO_2-$, $-PO-$, $-PO_2-$, or $-POR-$; and each occurrence of R^7 is independently R' , halogen, NO_2 , or CN ;

or a pharmaceutically acceptable salt or composition thereof.

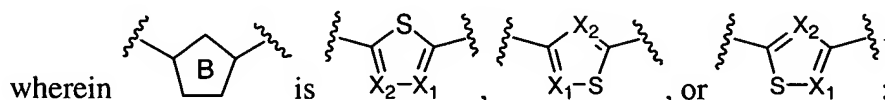
49. The method of claim 48, wherein the method comprises inhibiting ROCK activity.

50. A method of treating or lessening the severity of a disease condition or disorder selected from a proliferative disorder, a cardiac disorder, a neurodegenerative disorder, a psychotic disorder, an autoimmune disorder, a condition associated with organ transplant, an

inflammatory disorder, an immunologically mediated disorder, a viral disease, or a bone disorder, comprising the step of administering to said patient a compound having the formula:



or a pharmaceutically acceptable salt thereof, wherein:



R^1 is halogen, CN, NO_2 , or V_mR ;

Z^1 and Z^3 are each independently N or CR^Z , and Z^2 is N or CR^1 , provided that Z^1 , Z^2 and Z^3 are not simultaneously N;

each occurrence of R^Z is independently halogen, CN, NO_2 , or U_nR' ;

R^2 is U_nR' ;

X^1 and X^2 are each independently CR^4 or N;

each occurrence of R^4 is independently halogen, CN, NO_2 , or V_mR ;

each occurrence of U or V is independently an optionally substituted C_{1-6} alkylidene chain, wherein up to two methylene units of the chain are optionally and independently replaced by $-NR-$, $-S-$, $-O-$, $-CS-$, $-CO_2-$, $-OCO-$, $-CO-$, $-COCO-$, $-CONR-$, $-NRCO-$, $-NRCO_2-$, $-SO_2NR-$, $-NRSO_2-$, $-CONRNR-$, $-NRCONR-$, $-OCONR-$, $-NRNR-$, $-NRSO_2NR-$, $-SO-$, $-SO_2-$, $-PO-$, $-PO_2-$, or $-POR-$;

m and n are each independently 0 or 1;

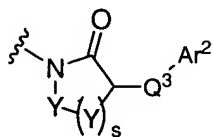
each occurrence of R is independently hydrogen or an optionally substituted C_{1-6} aliphatic group; and each occurrence of R' is independently hydrogen or an optionally substituted C_{1-6} aliphatic group, a 3-8-membered saturated, partially unsaturated, or fully unsaturated monocyclic ring having 0-3 heteroatoms independently selected from nitrogen, oxygen, or sulfur, or an 8-12 membered saturated, partially unsaturated, or fully unsaturated bicyclic ring system having 0-5 heteroatoms independently selected from nitrogen, oxygen, or sulfur; or R and R' , two occurrences of R, or two occurrences of R' , are taken together with the atom(s) to which they are bound to form an optionally substituted 3-12

membered saturated, partially unsaturated, or fully unsaturated monocyclic or bicyclic ring having 0-4 heteroatoms independently selected from nitrogen, oxygen, or sulfur;

Q^1 is $-CO-$, $-SO_2-$, $-CONR-$, or $-SO_2NR-$;

R^3 is Q^2-Ar^1 ,

or R^2 and Q^1-R^3 , taken together with the nitrogen atom, form the cyclic group:



, where s is 1 or 2, each occurrence of Y is independently, as valency and stability permit, $-CO-$, $-CS-$, $-SO_2-$, $-O-$, $-S-$, $-NR^5-$, or $-C(R^5)_2-$, and R^5 is U_nR' ;

Q^2 and Q^3 are each independently a bond or a C_{1-6} alkylidene chain, wherein up to two methylene units of the chain are each optionally and independently replaced by $-NR'-$, $-S-$, $-O-$, $-CS-$, $-CO_2-$, $-OCO-$, $-CO-$, $-COCO-$, $-CONR'-$, $-NR'CO-$, $-NR'CO_2-$, $-SO_2NR'-$, $-NR'SO_2-$, $-CONR'NR'-$, $-NR'CONR'-$, $-OCONR'-$, $-NR'NR'-$, $-NR'SO_2NR'-$, $-SO-$, $-SO_2-$, $-PO-$, $-PO_2-$, or $-POR'-$; and wherein any carbon atom in the one or more methylene units is optionally substituted with one or two occurrences of R^6 , wherein each occurrence of R^6 is independently halogen, CN , NO_2 , or U_nR' , or two occurrences of R^6 , or R' and R^6 , taken together with the atoms to which they are bound, form an optionally substituted 3-6-membered cycloalkyl, heterocyclyl, aryl or heteroaryl ring; and

Ar^1 and Ar^2 are each independently a 5-8 membered saturated, partially unsaturated, or fully unsaturated monocyclic ring having 0-3 heteroatoms independently selected from nitrogen, oxygen, or sulfur, or an 8-12 membered saturated, partially unsaturated, or fully unsaturated bicyclic ring system having 0-5 heteroatoms independently selected from nitrogen, oxygen, or sulfur; wherein Ar^1 and Ar^2 are each optionally substituted with 0-5 independent occurrences of TR^7 ; wherein T is a bond or is a C_1-C_6 alkylidene chain wherein up to two methylene units of T are optionally and independently replaced by $-NR-$, $-S-$, $-O-$, $-CS-$, $-CO_2-$, $-OCO-$, $-CO-$, $-COCO-$, $-CONR-$, $-NRCO-$, $-NRCO_2-$, $-SO_2NR-$, $-NRSO_2-$, $-CONRNR-$, $-NRCONR-$, $-OCONR-$, $-NRNR-$, $-NRSO_2NR-$, $-SO-$, $-SO_2-$, $-PO-$, $-PO_2-$, or $-POR-$; and each occurrence of R^7 is independently R' , halogen, NO_2 , or CN ;

or a pharmaceutically acceptable salt or composition thereof.

51. The method of claim 50, comprising the additional step of administering to said patient an additional therapeutic agent selected from a chemotherapeutic or anti-proliferative agent, an anti-inflammatory agent, an immunomodulatory or immunosuppressive agent, a neurotrophic factor, an anti-psychotic agent, an agent for treating cardiovascular disease, an agent for treating destructive bone disorders, an agent for treating liver disease, an anti-viral agent, an agent for treating blood disorders, an agent for treating diabetes, or an agent for treating immunodeficiency disorders, wherein:

said additional therapeutic agent is appropriate for the disease being treated; and
said additional therapeutic agent is administered together with said composition as a single dosage form or separately from said composition as part of a multiple dosage form.

52. The method of claim 50, wherein disease, condition, or disorder is allergy, asthma, diabetes, Alzheimer's disease, Huntington's disease, Parkinson's disease, AIDS-associated dementia, amyotrophic lateral sclerosis (ALS, Lou Gehrig's disease), multiple sclerosis (MS), schizophrenia, cardiomyocyte hypertrophy, reperfusion/ischemia (e.g., stroke), baldness, cancer, hepatomegaly, cardiovascular disease including cardiomegaly, cystic fibrosis, viral disease, autoimmune diseases, atherosclerosis, restenosis, psoriasis, inflammation, hypertension, angina pectoris, cerebrovascular contraction, peripheral circulation disorder, premature birth, arteriosclerosis, vasospasm (cerebral vasospasm, coronary vasospasm), retinopathy, erectile dysfunction (ED), AIDS, osteoporosis, Crohn's Disease and colitis, neurite outgrowth, or Raynaud's Disease.

53. The method of claim 50, wherein disease, condition, or disorder is atherosclerosis, hypertension, erectile dysfunction (ED), reperfusion/ischemia (e.g., stroke), or vasospasm (cerebral vasospasm and coronary vasospasm).